LIST OF PUBLICATIONS

Brehar Raluca Didona, Ph.D.

Ph.D. thesis

Brehar, Raluca Didona. "Adaptive Search Space Pruning and Multiple Attitude Pedestrian Detection Models." PhD diss., 2014.

List of journal papers

1	**R. D. Brehar**, M. P. Muresan, T. Marița, C. -C. Vancea, M. Negru and S. Nedevschi, "Pedestrian Street-Cross Action Recognition in Monocular Far Infrared Sequences," in *IEEE Access*, vol. 9, pp. 74302-74324, 2021, doi: 10.1109/ACCESS.2021.3080822 **IF: 4.3, Q1/Q2**
2	**Brehar, R**.; Mitrea, D.-A.; Vancea, F.; Marita, T.; Nedevschi, S.; Lupsor-Platon, M.; Rotaru, M.; Badea, R.I. Comparison of Deep-Learning and Conventional Machine-Learning Methods for the Automatic Recognition of the Hepatocellular Carcinoma Areas from Ultrasound Images. *Sensors* 2020, *20*, 3085. https://doi.org/10.3390/s20113085 **IF: 4.1, Q1/Q2**
3	Mitrea, D.-A.; **Brehar, R**.; Nedevschi, S.; Lupsor-Platon, M.; Socaciu, M.; Badea, R. Hepatocellular Carcinoma Recognition from Ultrasound Images Using Combinations of Conventional and Deep Learning Techniques. *Sensors* 2023, *23*, 2520. https://doi.org/10.3390/s23052520 , **IF: 4.1, Q1/Q2**

List of books and book chapters

1	Raluca Borca-Mureșan (căs.**Brehar**), Sergiu Nedevschi, Florin Măguran, Mixtures of Classifiers for Recognizing Standing and Running Pedestrians. In: Bolc, L., Kulikowski, J.L., Wojciechowski, K. (eds) Computer Vision and Graphics. ICCVG 2008. Lecture Notes in Computer Science, vol 5337. Springer, Berlin, Heidelberg. https://doi.org/10.1007/978-3-642-02345-3_34
2	R**aluca Didona Brehar,** Contributions to Feature Based PedestrianDetection Methods in Visible and InfraredMonocular Images, 2020, ISBN: 978-606-737-461-2
3	S. Nedevschi, T. Marița, R. Dănescu,F. Oniga, **R. Brehar**, I. Giosan, C. Vicaș, Procesarea imaginilor - Indrumator de laborator, ISBN 978-973-662-796-5
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5	Sergiu NEDEVSCHI, Tiberiu MARIȚA, Radu DĂNESCU, Florin ONIGA, **Raluca BREHAR**, Ion GIOSAN, Cristian VANCEA, Robert VARGA:

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6	Sergiu NEDEVSCHI, Tiberiu MARIȚA, Radu DĂNESCU, Florin ONIGA, **Raluca BREHAR,** Ion GIOSAN, Cristian VANCEA, Robert VARGA: IMAGE PROCESSING Laboratory Works, 2nd Edition, ISBN 978-606-737-626-5 https://biblioteca.utcluj.ro/files/carti-online-cu-coperta/626-5.pdf
7	Sergiu Nedevschi, Florin Oniga, Ion Giosan, Robert Varga, **Raluca Brehar**, Andra Petrovai: Pattern Recognition Systems- Laboratory Works 1st edition; 2023, ISBN 978-606-737-637-1, https://biblioteca.utcluj.ro/files/carti-online-cu-coperta/637-1.pdf

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1	Brehar, R.D., Sand, E.A., Hulea, AF., Mureşan, M.P.	Smart Vision Aid for the Blind: Enhancing Exploration. In: Gini, G., Filev, D., Precup, RE. (eds) Informatics in Control, Automation and Robotics. ICINCO 2024. Lecture Notes in Electrical Engineering, vol 1566. Springer, Cham. https://doi.org/10.1007/978-3-032-17899-2_9
2	Darius Iulian Stan, Mihnea Bogdan Jurcă and Raluca Didona Brehar	“Segmentation of the Retinal Vascular Network and Biomarker Quantification in OCTA Imaging," 2025 IEEE 21st International Conference on Intelligent Computer Communication and Processing (ICCP), Cluj-Napoca, Romania, 2025, pp. 1-8, doi: 10.1109/ICCP68926.2025.11427144.
3	Laurențiu Neghină and Raluca Didona Brehar	"A Semi-Automated System for Face Registration and Recognition in Video Streams," 2025 IEEE 21st International Conference on Intelligent Computer Communication and Processing (ICCP), Cluj-Napoca, Romania, 2025, pp. 1-7, doi: 10.1109/ICCP68926.2025.11427157
4	Daria-Eugenia Mihaila and Raluca Didona Brehar	"Automatic Scoliosis Assessment via Cobb Angle Estimation using I-MedSAM-Based Instance Segmentation," 2025 IEEE 21st International Conference on Intelligent Computer Communication and Processing (ICCP), Cluj-Napoca, Romania, 2025, pp. 1-8, doi: 10.1109/ICCP68926.2025.11427165.
5	Mitrea, Delia, Brehar, Raluca Itu, Razvan, Nedevschi, Sergiu, Socaciu,	Pancreatic Tumor Recognition from CT Images through Advanced Deep Learning Techniques, 2024 IEEE INTERNATIONAL CONFERENCE ON AUTOMATION, QUALITY AND TESTING, ROBOTICS, AQTR, 2024,

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11	Brehar R, Mitrea D-A, Vancea F, Marita T, Nedevschi S, Lupsor-Platon M, Rotaru M, Badea RI.	Comparison of Deep-Learning and Conventional Machine-Learning Methods for the Automatic Recognition of the Hepatocellular Carcinoma Areas from Ultrasound Images, Sensors. 2020; 20(11):3085
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20	Brehar, Raluca; Nedevschi, Sergiu	Scan window based pedestrian recognition methods improvement by search space and scale reduction," 2014 IEEE Intelligent Vehicles Symposium Proceedings, Dearborn, MI, 2014, pp. 529-534, doi: 10.1109/IVS.2014.6856571.
21	Brehar, Raluca; Nedevschi, Sergiu	"Pedestrian detection in infrared images using HOG, LBP, gradient magnitude and intensity feature channels," 17th International IEEE Conference on Intelligent Transportation Systems (ITSC), Qingdao, 2014, pp. 1669-1674, doi: 10.1109/ITSC.2014.6957933.
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23	Brehar, Raluca; Nedevschi, Sergiu	"Pedestrian detection in traffic scenes using multi-attitude classifiers," 16th International IEEE Conference on Intelligent Transportation Systems (ITSC 2013), The Hague, 2013, pp. 1077-1082, doi: 10.1109/ITSC.2013.6728375.
24	I. Toma, M. Chezan, R. Brehar, S. Nedevschi and D. Fensel,	"SIM, a Semantic Instrumentation and Monitoring Solution for Large Scale Reasoning Systems," 2011 IEEE Fifth International Conference on Semantic Computing, Palo Alto, CA, 2011, pp. 118-124, doi: 10.1109/ICSC.2011.49.
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7	R. Brehar, T. Marita, M. Negru, S. Nedevschi,	Pedestrian Identification in Infrared and Visible Images Based on Pose Keypoints Matching, Journal of Physics: Conference Series, Open AccessVolume 1780, Issue 111 February 2021 Article no. 0120332020 International Symposium on Automation, Mechanical and Design Engineering, SAMDE 2020, 26 December 2020 - 28 December 2020
8	R. D. Brehar, C. C. Vancea, M. P. Mureşan, S. Nedevschi and R. Dănescu,	Pose Based Pedestrian Street Cross Action Recognition in Infrared Images," 2021 IEEE 17th International Conference on Intelligent Computer Communication and Processing (ICCP), Cluj-Napoca, Romania, 2021, pp. 41-46, doi: 10.1109/ICCP53602.2021.9733650.
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Brehar Raluca Didona, September 2026