

Curriculum Vitae

prof. M.Sc. Ondrej Krejcar, Ph.D.

Vice-Rector for Science and Creative Activities
University of Hradec Kralove

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[Research Gate Profile](#)

[My Researcher ID Curriculum Vitae](#)

[https://www.researchgate.net/profile/Ondrej Krejcar](https://www.researchgate.net/profile/Ondrej_Krejcar)

<https://publons.com/researcher/1285302/ondrej-krejcar>



TOP 8% by RG Score
TOP 1% Reviewer 2019 by Publons

Education:

- Full Professor, University of Hradec Kralove, Czech Republic, Faculty of Informatics and Management, *System engineering and informatics*, 2017
- Associate Professor, VSB - Technical University of Ostrava, Czech Republic, Faculty of Electrical Engineering and Computer Science, *Technical Cybernetics*, Habilitation thesis: "User Adaptive Systems", 2011
- Ph.D., VSB - Technical University of Ostrava, Czech Republic, Department Measurement and Control, *Technical Cybernetics*, Doctoral thesis: "User localization usage for predictive data push technology in control systems", 2008
- M.Sc., VSB - Technical University of Ostrava, Czech Republic, *Control and Information systems*, Thesis: "Design patterns in control and information systems", 2002

Professional Career:

2020 until now	University of Hradec Kralove, Vice-Rector for Science and Creative Activities
2016-2020	University of Hradec Kralove, Faculty of Informatics and Management, vice-dean for Science and Research
2014 until now	University of Hradec Kralove, Faculty of Informatics and Management, head of Center for Basic and Applied Research
2011-2016	University of Hradec Kralove, Faculty of Informatics and Management, Co-ordinator for Scientific Activities
2005-2011	VSB - Technical University of Ostrava, Faculty of Electronics and Computer Science, Assistant Professor, Lecturer/researcher at <i>Centre for Applied Cybernetics</i>
2002-2005	VSB - Technical University of Ostrava, Department Measurement and Control, internal postgraduate
2001 (4 months)	INPG – Grenoble, France, Institut National Polytechnique de Grenoble, Ecole Nationale Supérieure d'Informatique et de Mathématiques Appliquées de Grenoble, Grenoble, France. <i>Researcher project</i> - Parallel programming algorithms (Unix, SunOS 5.7 (8x CPU))

Current memberships:

2020-now	Member of thematic panel 202 (Computer Science) at GACR (Czech Science Foundation)
2020-now	Chair of thematic panel 1 (Computer, Physical and Chemical Sciences) ZETA program at TACR (Technology Agency of the Czech Republic)
2019-now	Chair of Program Committee – TACR Kappa , EEA and Norwegian financial mechanism
2019-now	External Expert at COST Actions (intergovernmental framework for European Cooperation in Science and Technology)
2014-2019	Vice-Chair of thematic panel 7 (manufacturing, robotics and electrotechnics) TACR Epsilon program

Short CV

prof. Ondrej Krejcar Ph.D.

- ❖ **COST CA17136 Vice-leader WG4** (Management Committee member, from 2018)
- ❖ **COST CA16226** (Management Committee member substitute, from 2017)
- ❖ Editorial board of **MDPI Sensors** (JCR IF = 3,275 Q1/Q2)
- ❖ Editorial board of **MDPI Future Internet** (ISI WOK ESCI indexed)
- ❖ International Journal of Information and Database Systems, Inderscience Publications
- ❖ EAI Endorsed Transactions on Context-aware Systems and Applications
- ❖ Advances in Electrical and Electronic Engineering (SCOPUS indexed)
- ❖ lead guest editor of Special Issue on “Smart Solutions in Development of Smart Applications and Systems with Aspect of Usefulness and Sustainability” for **MDPI Future Internet**.
- ❖ guest editor of Special Issue on “Innovation and Socioeconomic Development” for **MDPI Economies**.
- ❖ was a lead guest editor of Special Issue on “Miscellaneous Service Delivery to Modern Mobile Devices” for Hindawi “Journal of Computer Networks and Communications”.
- ❖ He is also a member of more than 20 Technical and Program Organizing Committee and several Journal Editorial Boards.
- ❖ is an author of **70 impact factor journal papers (Thomson JCR)**, more than 100 Lecture Notes chapters in Springer (LNCS, LNAI, LNICST, IFIP, IFMBE) and more than 60 other conference papers (Thomson ISI Proceedings) on a range of topics in mobile information technology.
- ❖ His Thomson ISI WOK **h-index is 18** in Computer Science and Technical Cybernetics
- ❖ received more than **650 external citations** to his published scientific papers by **Thomson ISI WOK** database.
- ❖ edited the book “Modern Telemetry” from InTech publishing house in 2011
- ❖ chaired and organized a series of Special Sessions *on User Adaptive Systems for Mobile Wireless Systems* at ACIIDS conference (2011 and 2012), and *1st International Workshop on User Adaptive Systems for Mobile Wireless Systems* in 2010. He also co-organized an IFAC workshop on Programmable Devices and Embedded Systems PDeS in 2009.
- ❖ received his **Master of Science** in Control and Information Systems at Department of Measurement and Control, VSB Technical University of Ostrava, Czech Republic in 2002. He also received a **Ph.D.** in Technical Cybernetics at same department in 2008 and completed his **habilitation** in 2011 at faculty of electrical engineering and computer science on VSB Technical University of Ostrava, Czech Republic.
- ❖ is currently an Full Professor and vice-dean for science and research at University of Hradec Kralove, Czech Republic from 2011. He was a researcher at National Centre of Czech Republic - Centre for Applied Cybernetics at VSB Technical University of Ostrava, Czech Republic, from 2005 till 2012. His research and teaching interests are mainly is Smart and Adaptive approaches when developing a solutions for wireless connected mobile devices, embedded devices, wireless networks, software framework architectures, database caching and prebuffering, and localization of devices and peoples.
- ❖ spent 4 months as researcher at the Ecole Nationale Supérieure d’Informatique et de Mathématiques Appliquées de Grenoble, Institut National Polytechnique de Grenoble, France.
- ❖ was a member of working group on the Fifth European Community Framework Programme, TRANSCAT - Integrated Water Management of Transboundary Catchments. Co-investigator of several national grants of Czech Republic. During the last 5 years, he supervised over the fifteen master and bachelor students.
- ❖ *serves as an reviewer for impact factor journals (selected):*
 - “Sensors” (MDPI),
 - “Information Sciences” (ELSEVIER),
 - “Future Generation Computer Systems” (ELSEVIER),
 - “IEEE Access” (IEEE),
 - “Expert Systems and Applications” (ELSEVIER),
 - “Knowledge-Based Systems” (ELSEVIER),
 - “Symmetry-Basel” (MDPI),
 - “IEEE Sensors Journal” (IEEE),
 - “IEEE Transaction on Information Technology in Biomedicine” (IEEE),

- “Energies” (MDPI),
 - “Applied Thermal Engineering” (ELSEVIER),
 - “Computers and Electrical Engineering” (ELSEVIER),
 - “Mobile Information Systems” (Hindawi),
 - “Signal, Image and Video Processing” (Springer)
 - “Pervasive and Mobile Computing” (ELSEVIER),
 - “Computer Methods and Programs in Biomedicine Journal” (ELSEVIER),
 - “EURASIP Journal on Wireless Communications and Networking” (Hindawi) etc..
- ❖ is a member of ICST (Institute for Computer Sciences, Social-Informatics and Telecommunications Engineering) and several international program committees and editorial boards.

Participation on Research Projects (selected):

TACR Doprava 2020+ (Technology Agency of Czech Republic), Project CK01000190 - Sensory measurement of pedestrian communications in the urban environment to support mobility of people with health limitations, Member of working group. 2020-2022

OP VVV (Ministry of Education Youth and Sports), IT4Neuro (degeneration), CZ.02.1.01/0.0/0.0/18_069/0010054, **Leader of the Working Group – Clinical applications, HPC. 2019-2022**

TACR ETA (Technology Agency of Czech Republic), Project TL02000066 - *Effective knowledge transfer management*, Member of working group. **2018-2021**

EU project - COST Action CA17136, Indoor Air Pollution Network, 2018-2022, MC Member, Czech Republic, vice leader of WG4 - project: *Development of an Advanced Air Quality Assessment System in Residential and Office Environments*, proposer, UHK, FIM, Czech Republic

VES18 INTER-EXCELLENCE – INTER-COST, LTC18035, *Evaluation of the potential for reducing health and social expenses for elderly people using the smart environment*, Team member. **2018-2021**

TACR ETA (Technology Agency of Czech Republic), Project TL01000302 - *Medical devices development as an effective investment for public and private entities*, Member of working group. **2018-2021**

MPO, (Ministry of Industry and Trade of Czech Republic), Project CZ.01.1.02/0.0/0.0/16_084/0010298 – *Using advanced procedures for an integrated power system of energy system*, **Principal co-investigator. 2017-2018**

EU project - COST Action CA16226, Indoor living space improvement: Smart Habitat for the Elderly, 2017-2021, MC substitute, Czech Republic - project: *Evaluation of the potential for reducing health and social expenses for elderly people using the smart environment*, team member, UHK, FIM, Czech Republic

MPO, (Ministry of Industry and Trade of Czech Republic), OP PIK program - Inovation, Project No. CZ.01.1.02/0.0/0.0/17_206/0014866, "Protection of Industrial Property Rights at University of Hradec Kralove", **Principal investigator 2018-2019**

TACR, (Technology Agency of Czech Republic), Project TG02010020 – Centre for Transfer of Biomedical Technologies – PoC 2015-2019, Sub-project: **Design and Realization of Smart Furniture Solutions for Elderly and People with Respiratory Diseases in Areas with Air Pollution**, Principal investigator of subproject. **2019**

TACR, (Technology Agency of Czech Republic), Project TG02010020 – Centre for Transfer of Biomedical Technologies – PoC 2015-2019, Sub-project: **Image Processing by Gradual Gradient of Brightness**, Principal investigator of subproject. **2019**

TACR, (Technology Agency of Czech Republic), Project TG02010020 – Centre for Transfer of Biomedical Technologies – PoC 2015-2019, Sub-project: An electrosurgical instrument in the form of high-frequency power supply for biopsy and mini-invasive surgery for electrocoagulation of a liver, Principal Investigator of subproject. **2016-2018**

Grant Agency of Excellence, Project *Smart Solutions in Ubiquitous Computing Environments*, Faculty of Informatics and Management (FIM), University of Hradec Kralove. Applicant. 2014-2018

Project *SmartHomePoint Solutions for Ubiquitous Computing Environments*. Intern grants system, FIM, University of Hradec Kralove. Applicant. 2013-2019

IGA (Internal Grant Agency of Ministry of Health, Czech Republic) Project NT13532-4/2012 – Diagnosis of small intestinal damage NSAIDs using capsule endoscopy. Member of working group at **Faculty Hospital at Hradec Kralove**. (role in project-Artifacts Detection of Biomedical Images) **2012-2016**

Ministry of Education of Czech Republic, Project *CAK, Centre for Applied Cybernetics*, Embedded systems section, 1M0567, *Full time participation*, member of working group at VSB - TU Ostrava. **2005-2011**

TACR (Technology Agency of Czech Republic), Project TA01010632 - *SCADA system for control and monitoring of process in real time*, Member of working group at VSB - TU Ostrava. **2011-2013**

Project *User Adaptive Systems*. Intern grants system, Faculty of Electronics and Computer Science, VSB - TU Ostrava. Applicant. **2011**

Project *Mobile Biotelemetrical System – Guardian II*. Intern grants system, Faculty of Electronic and Computer Science, VSB - TU Ostrava. Applicant. **2010**

GACR (Grant Agency of Czech Republic) Project GA102/08/1429 – *Safety and Security of Networked Embedded System Applications*. Member of working group at VSB - TU Ostrava. **2008-2010**

Ministry of Industry and Trade of the Czech Republic, project of program TANDEM, FT-TA2/009. *Research and Development of Modular System for Creation of Applications usable in area of Integrated Water Management*. Member of working group at VSB - TU Ostrava, web testing, **2005-2007**

European Union – the Fifth European Community Framework Programme, *TRANSCAT - Integrated Water Management of Transboundary Catchments*. RTD project, EESD focus, EVK1-CT-2002-00124. Member of working group at VSB - TU Ostrava, web testing, **2003-2006**

FRVS GRANT Agency of Czech Republic - FRVS 379/04/G1, Krejcar, O., Cernohorsky, J.: *Mobile communications support of SCADA systems at Linux OS*. Applicant. **2003-2004**

Citations

Database	Journal articles	Conf. papers	Citations	H-index
Web of Science	80 + 5 ^(Book chapters)	186	575 (1163 ¹)	18
Scopus	95+ 4 ^(Book chapters)	243	918 (1714 ¹)	22
Google Scholar	394		2300 ¹	24

Achievements:

- *In 2018 14th Top peer reviewer in Multidisciplinary in the World by Publons*
- *Top reviewers in Cross-Field - September 2019 by Publons*

Supervision of Students

- 3 finished postgraduate students (M. Behan, A. Bartuskova, P. Blazek)
- 4 postgraduate students in progress
- 35 finished pregraduate students, 5 pregraduate students in progress

Garant of study program:

- Applied Informatics – Ph.D. study program, FIM, UHK

Research focus

Image Recognition, Image Segmentation, Video Processing, Biometrics, Inference Systems, Intelligent Systems, Control systems, Technical Cybernetics, User Adaptive Systems, Smart Systems, Mobile information technologies, Wireless communications, Location Based Services, Biomedical, Programming languages: Matlab, .NET, .NET CF, OpenNETCF, ASP.NET, Web Services, MS SQL Server, Delphi, Java, J2ME

¹ with self-citations

Invited Lectures at Prestigious Universities (selected)

Imperial College London, Imperial College Business School, United Kingdom, 2009, Lecture theme: *Modern Software and Hardware Tools for Utilization in Biomedical Systems*; 2009, Lecture theme: *Wireless Transfer of Biomedical Data and Their Processing on Mobile Embedded Devices*

Academia Sinica, Taipei, Taiwan, 2013, Lecture theme: *Smart Solutions in Ubiquitous Environments*

Tyndall National Institute, University College Cork, Ireland, 2014, Lecture theme: *Intelligent control and design of remote controlled Smart sensors*;

Selected International Collaborations

Malaysia (prof. Ali Selamat, dean at Malaysia Japan Institute of Technology – mobility tracking, Context-Awareness, Group decision making in knowledge based modelling), University of Granada, Spain (prof. Enrique Herrera-Viedma, Vice-Rector for Research and Knowledge Transfer, h-index 69 - group decision making, aggregation of information, information retrieval, digital libraries, recommender systems, block chain, smart cities, social media), University of Szeged, Hungary (Assoc. Prof. Attila Kertesz, Ph.D. – distributed computing and HPC for large scale Real-Time processing of human behaviour), University of Zilina, Slovakia (assoc. prof. Peter Brida – GPS and outdoor tracking and localisation), University of Malta (Dr. Noel Aquilina, Ph.D. – Machine learning approaches on large scale data), Tyndall National Institute - University College Cork, Ireland (Dr. Alan O'Riordan – Biosensors), AAIT – Addis Ababa University, Ethiopia (Dr. Dawit Assefa Haile – Medical Image Processing), University of Sibiu, Romania (prof. Remus Brad – Medical Image Processing), Wroclaw University of Technology (prof. Radoslaw Katarzyniak, prof. Ngoc Thanh Nguyen – Formal Languages), Riga Stradins University, Lithuania (Signe Tomsone, dean at Faculty of Rehabilitation - identifying the needs of different groups of seniors, evaluating the benefits of the proposed solution for a selected group), University of Technology, University of Sarajevo (Sabina Barakovic - multidimensional QoE modelling, mobile Web-based applications, QoS/QoE/QoL management, cybersecurity in smart environments and IoT/WoT), Technical University of Denmark (Assoc. Prof. Gabriel Beko – Quality of Life, Indoor Air Quality, Sensors), Universite de Lille, France (Dr. Benjamin Hanoune – Gas sensors and security of indoor environments).

Selected TOP Journal papers:

- Sengupta, A., Seal, A., Panigrahy, C., Krejcar, O., Yazidi, A., Edge Information Based Image Fusion Metrics Using Fractional Order Differentiation and Sigmoidal Functions, *IEEE Access*, vol. 8, pp. 88385-88398, DOI: 10.1109/ACCESS.2020.2993607, 2020 (**JCR Q1, Q1, Q1**) **IF (2018) =4,098**
- Kirimtat, A., Krejcar, O., Kertesz, A., Tasgetiren, M. F., Future Trends and Current State of Smart City Concepts: A Survey, *IEEE Access*, vol. 8, pp. 86448-86467, DOI: 10.1109/ACCESS.2020.2992441, 2020 (**JCR Q1, Q1, Q1**) **IF (2018) =4,098**
- Mohamad, M., Selamat, A., Krejcar, O., Fujita, H., Wu, T., An analysis on new hybrid parameter selection model performance over big data set, *Knowledge-Based Systems*, 192, art. no. 105441. DOI: 10.1016/j.knosys.2019.105441, 2020 (**JCR Q1**) **IF (2018) =5,101**
- Maresova, P., Krejcar, O., Barakovic, S., Barakovic Husic, J., Lameski, P., Zdravevski, E., Chorbev, I., Trajkovic, V., Health-Related ICT Solutions of Smart Environments for Elderly-Systematic Review, *IEEE Access*, 8, art. no. 9039617, pp. 54574-54600. DOI: 10.1109/ACCESS.2020.2981315, 2020 (**JCR Q1, Q1, Q1**) **IF (2018) =4,098**
- Kirimtat, A., Krejcar, O., Selamat, A., Herrera-Viedma, E., FLIR vs SEEK thermal cameras in biomedicine: Comparative diagnosis through infrared thermography, *BMC Bioinformatics*, 21, art. no. 88. DOI: 10.1186/s12859-020-3355-7, 2020 (**JCR Q2, Q2, Q1**) **IF (2018) =2,511**
- Seal, A., Karlekar, A., Krejcar, O., Gonzalo-Martin, C., Fuzzy c-means clustering using Jeffreys-divergence based similarity measure, *Applied Soft Computing Journal*, 88, art. no. 106016. DOI: 10.1016/j.asoc.2019.106016, 2020 (**JCR Q1, Q1**) **IF (2018) =4,873**
- Krejcar, O., Maresova, P., Selamat, A., Melero, F.J., Barakovic, S., Husic, J.B., Herrera-Viedma, E., Frischer, R., Kuca, K., Smart Furniture as a Component of a Smart City - Definition Based on Key Technologies Specification, *IEEE ACCESS*, 10.1109/ACCESS.2019.2927778, Volume 7, 2019, Article number 8758623, pp. 94822-94839, 2019 (**JCR Q1, Q1, Q1**) **IF (2018)=4,098**
- Karlekar, A., Seal, A., Krejcar, O., Gonzalo-Martin, C., Fuzzy K-Means Using Non-Linear S-D stance, *IEEE ACCESS*, Vol. 7, pp. 55121-55131, 2019 (**JCR Q1, Q1, Q1**) **IF (2018) =4,098**
- Kirimtat, A., Krejcar, O., Multi-objective energy and daylight optimization of amorphous shading devices in buildings (2019) *Solar Energy*, 185, pp. 100-111. DOI: 10.1016/j.solener.2019.04.048 (**JCR Q1**) **IF (2018)=4,674, Cit.: 1x**
- Kirimtat, A., Krejcar, O., A review of infrared thermography for the investigation of building envelopes: Advances and prospects (2018) *Energy and Buildings*, 176, pp. 390-406. DOI: 10.1016/j.enbuild.2018.07.052 (**JCR Q1, Q2, Q1**) **IF (2018)=4,495, Cit.: 4x**
- Postema, M., Abraham, H., Krejcar, O., Assefa D., Size determination of microbubbles in optical microscopy: a best-case

- scenario, Opt. Express, Vol. 25, pp. 33588-33601, 2017 (JCR Q1) IF=3,307, Cit.: 1x
- Sabbah, T., Selamat, A., Selamat, M. H., Al-Anzi, F.S., Viedma, E.H., Krejcar, O., Fujita, H., Modified frequency-based term weighting schemes for text classification, Applied Soft Computing Journal, 58, pp. 193-206, 2017 (JCR Q1, Q1) IF=2,857, Cit.: 13x
- Ismaila Idris, Ali Selamat, Ngoc Thanh Nguyen, Sigeru Omatu, Ondrej Krejcar, Kamil Kuca, Marek Penhaker, "A combined negative selection algorithm-particle swarm optimization for an email spam detection system". Engineering Applications of Artificial Intelligence. vol. 39, pp. 33-44, 2014. DOI 10.1016/j.engappai.2014.11.001. Published March 2015. ISSN: 09521976. (JCR Q1, Q1, Q1, Q1), IF=2,368, Cit.:12x
- Novozamsky, A., Flusser, J., Tacheci, I., Sulik, L., Bures, J., Krejcar, O., Automatic blood detection in capsule endoscopy video, Journal of Biomedical Optics, Vol. 21, Issue 12, Article Number: 126007, DOI: 10.1117/1.JBO.21.12.126007, Dec 2016 (JCR Q2, Q1, Q2), IF=2,556, Cit.: 2x
- Rezaei, Z., Selamat, A., Taki, A., Rahim, MSM., Kadir, MRA., Penhaker, M., Krejcar, O., Kuca, K., Herrera-Viedma, E., Fujita, H., Thin Cap Fibroatheroma Detection in Virtual Histology Images Using Geometric and Texture Features, Applied Sciences-Basel, Vol. 8, Iss. 9, Article Number: 1632, DOI: 10.3390/app8091632, SEP 2018 (JCR Q3, Q3, Q2) IF (2018) =2,217
- Mambou, S.J., Maresova, P., Krejcar, O., Selamat, A., Kuca, K. Breast cancer detection using infrared thermal imaging and a deep learning model (2018) Sensors, Vol. 18 (9), art. no. 2799. DOI: 10.3390/s18092799 (JCR Q2, Q2, Q1) IF (2018) =3,031, Cit.: 2x
- Krejcar, O., Jirka, J., Janckulik, D., "Use of Mobile Phone as Intelligent Sensor for Sound Input Analysis and Sleep State Detection". Sensors. vol. 11, Iss. 6, pp. 6037-6055, 2011. DOI 10.3390/s110606037. ISSN: 14248220. (JCR Q2, Q3, Q1), IF=2,033, Cit.: 44x
- Sobeslav V, Maresova P, Krejcar O, Franca TC, Kuca K. Use of cloud computing in biomedicine. J Biomol Struct Dyn. 2016. 17:1-10. (JCR Q2, Q2) IF=2,136; 11x

Journal Editorial Boards :

- MDPI Sensors (ISI WOK – JCR Q2,Q2,Q1, IF=3,327)
- MDPI Future Internet (ISI WOK – ESCI, SCOPUS SJR)
- Advances in Electrical and Electronic Engineering (ISI WOK - ESCI, SCOPUS SJR)
- MDPI Applied System Innovation
- International Journal of Information and Database Systems, Inderscience Publications
- EAI Endorsed Transactions on Context-aware Systems and Applications

FULL LIST of Journal papers index by JCR ISI WoK (with IF) for 2018-2020 descending by time:

2020

- Mohamad, M., Selamat, A., Krejcar, O., Fujita, H., Wu, T. An analysis on new hybrid parameter selection model performance over big data set (2020) Knowledge-Based Systems, 192, art. no. 105441. DOI: 10.1016/j.knosys.2019.105441
IF (2018) = 5,101 (Q1)
- Seal, A., Karlekar, A., Krejcar, O., Gonzalo-Martin, C. Fuzzy c-means clustering using Jeffreys-divergence based similarity measure (2020) Applied Soft Computing Journal, 88, art. no. 106016. DOI: 10.1016/j.asoc.2019.106016
IF (2018) = 4,873 (Q1,Q1)
- Kirimtat, A., Krejcar, O., Kertesz, A., Tasgetiren, M.F. Future Trends and Current State of Smart City Concepts: A Survey (2020) IEEE Access, 8, art. no. 9086495, pp. 86448-86467. DOI: 10.1109/ACCESS.2020.2992441
IF (2018) = 4,098 (Q1,Q1,Q1)
- Sengupta, A., Seal, A., Panigrahy, C., Krejcar, O., Yazidi, A. Edge Information Based Image Fusion Metrics Using Fractional Order Differentiation and Sigmoidal Functions (2020) IEEE Access, 8, art. no. 9090867, pp. 88385-88398. DOI: 10.1109/ACCESS.2020.2993607
IF (2018) = 4,098 (Q1,Q1,Q1)
- Maresova, P., Krejcar, O., Barakovic, S., Barakovic Husic, J., Lameski, P., Zdravevski, E., Chorbev, I., Trajkovik, V. Health-Related ICT Solutions of Smart Environments for Elderly-Systematic Review (2020) IEEE Access, 8, art. no. 9039617, pp. 54574-54600. DOI: 10.1109/ACCESS.2020.2981315

IF (2018) = 4,098 (Q1,Q1,Q1)

Kuca, K., Musilek, K., Jun, D., Nepovimova, E., Soukup, O., Korabecny, J., França, T.C.C., de Castro, A.A., Krejcar, O., da Cunha, E.F.F., Ramalho, T.C. Oxime K074-in vitro and in silico reactivation of acetylcholinesterase inhibited by nerve agents and pesticides (2020) *Toxin Reviews*, 39 (2), pp. 157-166. DOI: 10.1080/15569543.2018.1485702

IF (2018) = 3,84 (Q1)

Fadeyi, O., Krejcar, O., Maresova, P., Kuca, K., Brida, K., Selamat, A. Opinions on sustainability of smart cities in the context of energy challenges posed by cryptocurrency mining (2020) *Sustainability (Switzerland)*, 12 (1), art. no. 169. DOI: 10.3390/sul2010169

IF (2018) = 2,592 (Q2,Q2,Q2,Q3)

Kirimtat, A., Krejcar, O., Selamat, A., Herrera-Viedma, E. FLIR vs SEEK thermal cameras in biomedicine: Comparative diagnosis through infrared thermography (2020) *BMC Bioinformatics*, 21, art. no. 88. DOI: 10.1186/s12859-020-3355-7

IF (2018) = 2,511 (Q2,Q2,Q1)

Baraković, S., Husić, J.B., Van Hoof, J., Krejcar, O., Maresova, P., Akhtar, Z., Melero, F.J., Quality of life framework for personalised ageing: A systematic review of ICT solutions, (2020) *International Journal of Environmental Research and Public Health*, 17 (8), art. no. 2940. DOI: 10.3390/ijerph17082940

IF (2018) = 2,468 (Q2,Q1,Q2)

Zuhair, H., Selamat, A., Krejcar, O. A multi-tier streaming analytics model of 0-day ransomware detection using machine learning, (2020) *Applied Sciences (Switzerland)*, 10 (9), art. no. 3210. DOI: 10.3390/app10093210

IF (2018) = 2,217 (Q3,Q3,Q2)

Baraković, S., Husić, J.B., Maraj, D., Maraj, A., Krejcar, O., Maresova, P., Melero, F.J. Quality of life, quality of experience, and security perception in web of things: An overview of research opportunities (2020) *Electronics (Switzerland)*, 9 (4), art. no. 700. DOI: 10.3390/electronics9040700

IF (2018) = 1,764 (Q3)

Frischer, R., Krejcar, O., Maresova, P., Fadeyi, O., Selamat, A., Kuca, K., Tomson, S., Teixeira, J.P., Madureira, J., Melero, F.J. Commercial ICT smart solutions for the elderly: State of the art and future challenges in the smart furniture sector (2020) *Electronics (Switzerland)*, 9 (1), art. no. 149. DOI: 10.3390/electronics9010149

IF (2018) = 1,764 (Q3)

Frischer, R., Krejcar, O., Selamat, A., Kuca, K. 3D surface profile diagnosis using digital image processing for laboratory use [实验室用数字图像处理进行三维表面轮廓诊断] (2020) *Journal of Central South University*, 27 (3), pp. 811-823. DOI: 10.1007/s11771-020-4333-y

IF (2018) = 0,973 (Q3)

2019

Kirimtat, A., Krejcar, O., Ekici, B., Fatih Tasgetiren, M. Multi-objective energy and daylight optimization of amorphous shading devices in buildings (2019) *Solar Energy*, 185, pp. 100-111. DOI: 10.1016/j.solener.2019.04.048

IF (2018) = 4,674 (Q1)

Karlekar, A., Seal, A., Krejcar, O., Gonzalo-Martin, C. Fuzzy K-means using non-linear S-Distance (2019) IEEE Access, 7, art. no. 8693780, pp. 55121-55131. DOI: 10.1109/ACCESS.2019.2910195

IF (2018) = 4,098 (Q1,Q1,Q1)

Krejcar, O., Maresova, P., Selamat, A., Melero, F.J., Barakovic, S., Husic, J.B., Herrera-Viedma, E., Frischer, R., Kuca, K. Smart Furniture as a Component of a Smart City-Definition Based on Key Technologies Specification (2019) IEEE Access, 7, art. no. 8758623, pp. 94822-94839. DOI: 10.1109/ACCESS.2019.2927778

IF (2018) = 4,098 (Q1,Q1,Q1)

Kolda, L., Krejcar, O., Selamat, A., Kuca, K., Fadeyi, O. Multi-biometric system based on cutting-edge equipment for experimental contactless verification (2019) Sensors (Switzerland), 19 (17), art. no. 3709. DOI: 10.3390/s19173709

IF (2018) = 3,031 (Q2,Q2,Q1)

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