PUBLICACIONES EN REVISTAS INTERNACIONALES

- M. Jamshidijam, R.V. Mangalaraja, A. Akbari-Fakhrabadi, J. Usuba, T. Pandiyarajan, R. Udayabhaskar, N. Escalona, S.H. Chan,
 "Evaluation of microstructural and electrical properties of tubular Ni-Ce_{0.8}Sm_{0.2}O_{1.9} composite anode for SOFC," Materials Research Express, 6, 2019, 115536.
- T. Arun, S.K. Verma, Pritam K. Panda, R.J. Joseyphus, E. Jha, A. Akbari-Fakhrabadi, P. Sengupta, D.K. Raya, V.S. Benitha,
 K. Jeyasubramanyan, P.V. Satyam, *"Facile synthesized novel hybrid graphene oxide/cobalt ferrite magnetic nanoparticles based surface coating material inhibit bacterial secretion pathway for antibacterial effect,"* Materials Science and Engineering: C, 104, 2019, 109932.
- M. Muneeswaran, J.W. Jang, J.H. Jeong, A. Akbari-Fakhrabadi, N.V. Giridharan, "Effect of dopant-induced defects on structural, electrical, and enhanced ferromagnetism and magnetoelectric properties of Dy and Sr co-doped BiFeO₃" Journal of Materials Science: Materials in Electronics, 30, 2019, 7359–7366.
- T. Arun, T. K. Kumar, R. Udayabhaskar, and R. V Mangalaraja, A. Akbari-Fakhrabadi, "Nano hexagonal Co₃O4 platelets for supercapacitor applications," Materials Research Express, 6, 2019, 0850b1.
- S. Farhang-Sahlevani, T. Pandiyarajan, F. Sanhueza, A. Akbari-Fakhrabadi, H.D. Mansilla, D. Contreras, R.V. Mangalaraja, M.A.
 Gracia-Pinilla, "A facile hydrothermal synthesis of CeO2 nanocubes decorated ZnO nanostructures: optical and enhanced photocatalytic properties," Journal of Materials Science: Materials in Electronics, 30, 2019, 11643–11651.
- A. Thirumurugan, K. Prabakaran, R. Udayabhaskar, R.V. Mangalaraja, A. Akbari-Fakhrabadi, "Carbon decorated octahedral
 shaped Fe3O4 and α-Fe2O3 magnetic hybrid nanomaterials for next generation supercapacitor applications," Applied Surface Science, 485, 2019, 147-157.
- B. Karthikeyan, S. Hariharan, A. Sasidharan, V. Gayathri, T. Arun, A. Akbari-Fakhrabadi, C. Madhumith, "Optical, vibrational and fluorescence recombination pathway properties of nano SiO2-PVA composite films," Optical Materials, 90, 2019, 139–144.
- T. Jayaramudu, K. Varaprasad, R. D. Pyarasani, K. K. Reddy, K. D. Kumar, A. Akbari-Fakhrabadi, R.V. Mangalaraja, J. Amalraj,
 "Chitosan capped copper oxide/copper nanoparticles encapsulated microbial resistant nanocomposite films," International Journal of Biological Macromolecules, 128, 2019, 499–508.
- A. Akbari-Fakhrabadi, O. Rodriguez, R. Rojas, V. Meruane, M.H. Pishahang, "Ferroelastic behavior of LaCoO₃: A comparison of impression and compression techniques," Journal of European Ceramic Society, 39, 2019, 1569–1576.
- V. Pizarro-Carmona, M. Cortés-Carmona, R. Palma-Behnke, W. Calderón, M. E. Orchard, P. A. Estévez, "An Optimized
 Impedance Model for the Estimation of the State-of-Charge of a Li-Ion Cell: The Case of a LiFePO4 (ANR26650)," Energies, 12, 2019, 681.
- J. M. Cardemil, F. Cortés, A. Díaz, R. Escobar, Reply to *"Comment on 'Thermodynamic evaluation of solar-geothermal hybrid power plants in northern Chile,"* [Energy Convers. Manage. 2016;123: 348-361] by Cardemil et al.," Energy Convers. Manag., 185, 2019, 944-945.
- R. Leiva-Illanes, R. Escobar, J. M. Cardemil, D.-C. Alarcón-Padilla, J. Uche, A. Martínez, "Exergy cost assessment of
 CSP driven multi-generation schemes: Integrating seawater desalination, refrigeration, and process heat plants," Energy Convers. Manag. 179, 2019, 249–269.
- C. Campos, D. Vasco, C. Angulo, P. A. Burdiles, J. M. Cardemil, H. Palza, "About the relevance of particle shape and graphene oxide on the behavior of direct absorption solar collectors using metal based nanofluids under different radiation intensities," Energy Convers. Manag., 181, 2019, 247-257.
- 14 C. Mata-Torres, A. Zurita, J. M. Cardemil, R.A. Escobar, *"Exergy cost and thermoeconomic analysis of a Rankine Cycle + Multi-Effect Distillation plant considering time-varying conditions,"* Energy Convers. Manag., 192, 2019, 114–132.
- 15 C. Correa-Jullian, J. M. Cardemil, E. López Droguett, M. Behzad, "Assessment of deep learning techniques for prognosis of solar thermal systems," Renewable Energy, 145, 2019, 2178–2191.
- **R. Fernández**, J. Bertrand, *"Cold spray aluminum-alumina cermet coatings: effect of alumina morphology,"* Journal of Thermal Spray Technology, 28, 2019, 737-755.

17	R. Frederick, "Heat transfer enhancement in a cubical enclosure with hot and cold sectors in two opposite vertical walls", International Journal of Thermal Sciences, 145, 2019, 106035.
18	R. H. Hernández and L. Tapia, <i>"Vortex dynamics and scalar transport in the wake of a flat-plate controlled by a vibrating trailing-edge flap,"</i> International Journal of Heat and Fluid Flow, 81, 2019, 108526.
19	A. Aria, E. López Droguett , M. Modarres, S. Azarm, <i>"Estimating damage size and remaining useful life in degraded structures using deep learning-based multi-source data fusion,"</i> Structural Health Monitoring, 2019, https://doi.org/10.1177/1475921719890616
20	T. Zhou, M. Modarres, E. López Droguett , <i>"Multi-unit risk aggregation with consideration of uncertainty and bias in risk metrics,"</i> Reliability Engineering and System Safety, 188, 2019, 473–482.
21	S. Cofre, P. Kobrich, E. López Droguett, V. Meruane , "Deep convolutional neural network based structural damage localization and quantification using transmissibility data," Shock and Vibration, 2019, 9859281.
22	H. Duarte, E. López Droguett , <i>"A novel quantitative ecological and microbial risk assessment methodology,"</i> Human and Ecological Risk Assessment: An International Journal, 2019, https://doi.org/10.1080/10807039.2019.1596736
23	G. San Martin, E. López Droguett, V. Meruane , M. Moura, <i>"Deep variational auto-encoders: a promising tool for dimensionality reduction and ball bearing elements fault diagnosis,"</i> Structural Health Monitoring, 18, 2019, 1092-1128.
24	A. de la Fuente, V. Meruane , C. Meruane, <i>"Hydrological early warning system based on a deep learning runoff model coupled with a meteorological forecast,"</i> Water, 11, 2019, 1808.
25	V. Meruane, C. Espinoza, E. López Droguett, A. Ortiz-Bernardin, "Impact identification using nonlinear dimensionality reduction and supervised learning," Smart Materials and Structures, 28, 2019, 115005.
26	V. Meruane, I. Fernández, R. O. Ruiz, G. Petrone, E. López Droguett. "Gapped Gaussian smoothing technique for debonding assessment with automatic thresholding". Structural Control and Health Monitoring, 26(8), 2019, e2371.
27	P. Peralta, R. O. Ruiz, V. Meruane , "Experimental study of the variations in the electromechanical properties of piezoelectric energy harvesters and their impact on the frequency response function," Mechanical Systems and Signal Processing, 115, 2019, 469-482.
28	J. Y. Aguilar-Hurtado, A. Vargas-Uscategui, D. Zambrano-Mera, R. Palma-Hillerns , "The effect of boron content on the microstructure and mechanical properties of Fe50-XMn30Co10Cr10BX (x=0, 0.3, 0.6 and 1.7 wt%) multi-component alloys prepared by arc-melting," Materials Science and Engineering: A, 748, 2019, 244–252.
29	A. Ortiz-Bernardin , C. Alvarez, N. Hitschfeld-Kahler, A. Russo, R. Silva-Valenzuela, E. Olate-Sanzana, "Veamy: an extensible object-oriented C++ library for the virtual element method," Numerical Algorithms, 82, 2019, 1189–1220.
30	N. Amigo, A. Valencia , "Determining significant morphological and hemodynamic parameters to assess the rupture risk of cerebral aneurysms," Journal of Medical and Biological Engineering, 39, 2019, 329–335.
31	A. Aranda, A. Valencia , "Computational study on the rupture risk in real cerebral aneurysms with geometrical and fluid- mechanical parameters using FSI simulations and machine learning algorithms," Journal of Mechanics in Medicine and Biology, 19, 2019, 1950014.
32	A. A. Calderón, J. C. Ugalde, L. Chang, J. C Zagal , N. Pérez-Arancibia, <i>"An earthworm-inspired soft robot with perceptive artificial skin,"</i> Bioinspiration & Biomimetics, 14, 2019, 056012.