



IEEE Latin America Transactions

FEBRUARY 2021, Volume 19 Issue 2

IEEEXplore, DOI, ISI, ISSN 1548-0992

REGULAR ISSUE: Electronics, Energy and Computing

Table of Contents	171
A Comparison Between Reported Values and Measured Values of Power Factor and Efficiency for Electric Induction Motors	
D. F. Souza, F. A. M. Salotti, I. L. Sauer, H. Tatizawa and A. G. Kanashiro.....	173
Determining Voltage Control Areas in Large Scale Power Systems Based on Eigenanalysis of the QV Sensitivity Matrix	
R. M. Henriques, G. N. Taranto and J. A. Passos-Filho.....	182
Generating Solar Irradiance Data Series with 1-minute Time Resolution Based on Hourly Observational Data	
T. G. Soares, F. J. L. Lima, and F. R. Martins.....	191
Comparative Analysis of Different Methods Associated to the Frozen Permeability Method for On-Load Cogging Torque Evaluation in Permanent Magnet Synchronous Machines	
L. F. de Assis, C. C. L. Filho, G. T. de Paula and B. P. de Alvarenga.....	199
Force Profile Characterization for Thermostatic Bimetal using Extreme Learning Machine	
J. M. Melchor-Leal and J. A. Cantoral-Ceballos.....	208
Cloud Variance Impact on the Voltage and Power Flow of Distribution Networks with Photovoltaic Generators	
Martins, C. C., Sperandio, M and Welfer D.....	217
Energy Evaluation Applied to Serial Manipulator	
E. A. G. Barbosa, M. A. G. Palacios, L. A. A. Cortés, J. J. G. Barbosa and C. A. B. Martínez.....	226
Sensitivity Analysis of Data Center Electrical Infrastructures Considering Aspects of Dependability and Cost	
F. F. L. Melo, E. T. G. Sousa and G. R. A. Callou.....	235
Analysis of Window Size and Statistical Features for SVM-based Fault Diagnosis in Bearings	
J. S. Souza, M. V. L. dos Santos, R. S. Bayma and A. L. A. Mesquita.....	243
Modeling and Control of a Single-Phase Grid- Connected Inverter with LCL Filter	
J. P. Bonaldo, J. A. O. Filho, A. M. S. Alonso, F. P. Marafão and H. K. Morales-Paredes.....	250
Analysis of Turn-to-Turn Transient Voltage Distribution in Electrical Machine Windings	
R. S. Ferreira and A. C. Ferreira.....	260
A Double-Auction Mechanism for Distribution of Electrical Supply Capacities among Enterprises of an Industrial Park	
A. M. Rocchi, E. S. Fernandez and J. R. Vega.....	269

Experimental Validation of Inverse M-PPM Modulation for Dimming Control and Data Transmission in Visible Light Communications	
J.L. Henao-Rios, N. Guerrero-González and J. C. García- Álvarez.....	280
Optimal Allocation of Energy Storage System in Distribution Systems with Intermittent Renewable Energy	
L. R. Pontes, H. R. Espinoza, Y. P. Molina, and J. E. Luyo.....	288
Using Magnetic Control of DC-DC Converters in LED Driver Applications	
H. F. Chinchero and J. M. Alonso	297
Electromagnetic Launching System as an Alternative to Non-Destructive Sonic Wave Generation for Steel Bar Length Determination	
I. Silva, M. Bonfim, and, V. Faro.....	306
Optimized Exploitation of Ancillary Services: Compensation of Reactive, Unbalance and Harmonic Currents Based on Particle Swarm Optimization	
A. M. S. Alonso, B. R. Pereira-Junior, D. I. Brandao and F. P. Marafão.....	314
Design and Operational Optimization of CCHP Systems Using a Hybrid Method Based on MILP	
S. B. L. Souza; M. F. P. Souza; L. A. Freitas; P. P. Silva; F. M. Melo and F. S. Magnani.....	326
Determining the Reliability of Power Transformers Considering a Five States Markov Model	
S. C. Freitag, and M. Sperandio.....	335
Local Adaptive Bivariate Shrinkage Function for Seisogram Wavelet-Based Denoising	
Y. Cesaire and R. Trujillo.....	342