

Journal of Science & Technology **Transaction on: Electrical Engineering**

February-March 2010

Editor-in-Chief: Abolhassan Vafai

This Journal is published under the auspices of Sharif University of technology, Office of the Vice-Chancellor-in-Charge of Research.

The Journal is published every two months in Farsi language, aims at establishing a relationship between scientists active in different branches of science and technology and, in particular, at providing a forum for exchange of knowledge between scientists and technologists related to scientific problems prevailing in contemporary society. The journal also strives to present practical and theoretical analyses of these issues and facilitates the circulation of modern scientific findings by scientists and researchers for practical application. In addition, "Sharif" publishes papers focusing on issues of specific concern to universities, including research, technological advancements, and topics related to matters of higher education.

P.O.BOX 11155-8639 AZADI AVENUE, TEHRAN, I.R. IRAN
Phone: (98-21) 66005419 - 66164093 Fax: (98-21) 66012983
Web: http://www.sharifjournal.ir/ E-mail: pajouhesh@sharif.edu

- 3 COMPARATIVE ANALYSIS OF ADSL EQUALIZATION TECHNIQUES
 M R Pakrayan
- 11 DESIGNING PIECEWISE H_{∞} CONTROLLERS FOR PIECEWISE AFFINE SYSTEMS

B. Molaei and M. Mobed

21 ESTIMATION OF NON SINUSOIDAL VOLTAGE EFFECTS ON THE POWER CONSUMPTION OF AN AGGREGATED LOAD ON THE BASIS OF IMPROVED LOAD MODEL

R. Bagheri, J.S. Moghani and G.B. Gharehpetian

31 SOURCE CODED MODULATION FOR DISCRETE SOURCES WITH MEMORY

A. Payandeh, M. Ahmadian and M. R. Aref

37 INVESTIGATION OF FAULT LOCATION EFFECT ON THE INTER-AREA OSCILLATIONS IN STRESSED POWER SYSTEMS USING MODAL SERIES METHOD

A.Hesami Naghshbandy, A. Kazemi and H. M. Shanechi

47 A NOVEL CONTROL STRATEGY FOR POWER SYSTEM STABILITY IMPROVEMENT USING FUZZY LOGIC CONTROLLED STATCOM WITH DIFFERENT INPUT SIGNALS

A. Ghafouri, M-Reza Zolghadri and M. Ehsan

57 LINEAR DISTINGUISHING ATTACK ON A SIMPLIFIED VERSION OF WG 128

A. Shadman, J. Mohajeri and M. Salmasizadeh

RESEARCH NOTE

63 PERFORMANCE COMPARISON FOR SPECTRAL-BASED DOA ESTIMATION ALGORITHMS AND PROPOSAL OF A HIGH-RESOLUTION AND LOW COMPUTATIONAL COST ALGORITHM

S. Naderi Shahi, K. Sadeghi and M. Emadi

APPENDIX

74 ABSTRACTS OF PAPERS IN ENGLISH