

Table of contents

<u>Petre P.Teodorescu</u> , <i>Veturia Chiroiu</i> A Continuous Approach of the Contact Dynamics	9
<i>Ligia Munteanu, Cornel Brişan</i> On the Modeling of Contact Interfaces with Frictional Slips	17
<i>Zoltan Iosif Korka, Călin-Octavian Micloşină, Vasile Cojocaru</i> An Experimental Study of the Cutting Forces in Metal Turning	25
<i>Calin-Octavian Miclosina, Zoltan-Iosif Korka, Vasile Cojocaru, Catalin Lorinti</i> Some Aspects on Technological Design of a Cam Type Workpiece Using CATIA Software	33
<i>Florin Peris-Bendu, Adelina Bostan, Viorel Câmpian, Dorian Nedelcu</i> Considerations Regarding the Stresses and the Deformations of the Butterfly Valve Body	39
<i>Vasile Cojocaru, Zoltan Iosif Korka, Calin-Octavian Miclosina</i> Influence of the Mesh Parameters on Stresses and Strains in FEM Analysis of a Gear Housing	47
<i>Cornel Iacob-Mare, Tiberiu Ştefan Mănescu</i> Experimental Determination of Chassis Tensions Freight Wagons with High Walls Tensometriei Resistive Method	53
<i>Ana Gheorghe</i>	

Comparison Criteria and Performance Levels for Soundproofing Panels Made in Different Constructive Variants	63
<i>Fatai Sado, Faris Waleed</i>	
An Effective Strategy for Enforcing Ethics Compliance amongst Engineering Industries in the Developing World	76
<i>Vasile Ovidiu</i>	
Insertion Loss Analysis of the Acoustic Panels with Composite Construction	85
<i>Gheorghe Vertan, Teodor Eugen Man, Eugen Constantin Isbășoiu, Adalbert Kovacs</i>	
New Products and Technologies, Based on Calculations Developed Areas	92
<i>Tiberiu Mănescu Jr., Gilbert-Rainer Gillich, Ion Dumitru Lorand Kun</i>	
Considerations on the Approach of Rolling Contact Fatigue Assuming Multiaxial States of Stress	105
<i>Eugen-Marius Afronie, Tiberiu Stefan Mănescu</i>	
Simulation of Road safety H2 Railing with different Spacing between Pillars	115
<i>Florin Trofin</i>	
Climate Changes and their Influence on the Design of Hydraulic Structures from Romania	121
<i>Hossein Jarrahzadeh, Shahram Shahrooi</i>	
Examination of Cyclic Plasticity Models Under Uniaxial Loading by Finite Elements Method	133
<i>Nur Shuhada Ghazali, Md Azree Othuman Mydin, Nik Fuaad Nik Abllah</i>	
Potential of Biogas Power Plant Produced by	141

Anaerobic Digestion of Biodegradable Materials <i>Navid Bozorgan, Nariman Bozorgan</i>	
Effect of Nanofluids on Heat Pipe Thermal Performance: A Review of the Recent Literature	155
 <i>Cornel Iacob-Mare</i>	
Railways Factory in Resita	167
 <i>Carmen Debeleac</i>	
Evaluation of the Moldboard Structure Resistance of the Grader Equipment	171
 <i>Ioan Fitigau, Gavril Todorean</i>	
Opnet Analyze for FTP and Video Networktraffic using IP over MPLS Protocol	177
 <i>Gheorghe Samoilescu, Sergiu Nicolae, Florențiu Deliu, Raluca Apostol – Mateș</i>	
The Analysis Regarding the Building of a Hydraulic Power Plant on the Black Sea Shore	187
 <i>Florențiu Deliu, Gheorghe Samoilescu, Paul Burlacu</i>	
Dependence of the Maximum Power and Wind Speed	196
 <i>Cristian P. Chioncel, Marius Babescu, Petru Chioncel</i>	
The Possibility of Functioning at Maximum Power for Solar Photovoltaic - Electric Battery Systems	209
 <i>Petru Chioncel, Cristian Paul Chioncel, Nicoleta Gillich</i>	
Solution for Improve the Efficiency of Solar Photovoltaic Installation	217
 <i>Petru Chioncel, Cristian Paul Chioncel</i>	
Modulated Field Synchronous Generator for Wind Turbines	221
 <i>Arina Negoiteșcu, Adriana Tokar</i>	
Influence of Urban Traffic Driving Conditions and	227

Vehicle Cubic Capacity on CO and VOC Emissions

Adriana Tokar, Arina Negoïtescu

The Influence of the Water Supply Indoor Installations Pipes Wear and Clogging on Water Consumption and Hygiene and Sanitary Comfort Level 239

Dusan Popov, Nicolina Pop, Cornel Hatiegan

Some Theoretical Observations Concerning the Reverberation Time for the Case of a Harmonic Emitting Source 251

Valentin Nedelea, Ladislau Augustinov

The Evaluation of the Functional Performances for Microhydroaggregates Endowed with Asynchronous Generators by Vibrations Measurements 259

Elisabeta Spunei, Laurențiu Pădeanu, Florina Piroi, Ion Piroi, Gheorghe Liuba

The Synchronous Generators Rated Speed's Influence on Electromagnetic Stresses and on Costs 267

Ioan Ruja, Constantin Marta, Florin Brabăn

Research on the Command of a Single-Phase Frequency Converter at High Frequencies 275

Ajayi Adedayo, Olotu Yahaya, D.K Jerome

Development and Evaluation of a 2KVA Inverter 286

Bukola Olalekan Bolaji, Olugbenga Oluseyi Akande

Development and Performance Evaluation of a Ceramic Filter for Point-of-Use Water Purification 301