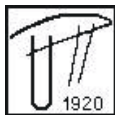




Transilvania
University of Braşov



Politehnica
University of Timișoara



Tehcnical University
of Cluj-Napoca

The 11th International Conference on
**OPTIMIZATION OF ELECTRICAL
AND ELECTRONIC EQUIPMENT**

optim
2008

May 22-24, 2008
Braşov, Romania

Sponsored by:

IEEE - The Institute of Electrical and Electronics Engineers

IET - The Institution of Engineering and Technology

CONFERENCE PROGRAM

The 11th International Conference on
OPTIMIZATION OF ELECTRICAL AND ELECTRONIC EQUIPMENT
May, 22-24, 2008, Aula Magna "Transilvania" University of Brasov
B-dul Iuliu Maniu Nr. 52, 500091, Brasov, Romania

GENERAL PROGRAM

Wednesday, May 21

- 12:00-20:00 Guests' pick up from *Henri Coanda* Bucharest International Airport and
Braşov Railway Station
14:00 - 22:00 Secretariat Late Registration

Thursday, May 22

- | | | |
|-------------|----------------------------|--------------------|
| 08:00-20:00 | Secretariat | Late Registration |
| 08:30-10:45 | Aula | Plenary Session 1 |
| 10:45-11:00 | Lobby First Floor | Coffee Break |
| 11:00-13:00 | Aula, Rooms 1, 2, 3, 4 | Paper Sessions 1 |
| 13:00-14:00 | Lobby Second Floor | Lunch |
| 14:00-15:00 | Lobby First Floor | Dialogue Session 1 |
| 15:00-17:30 | Aula, Rooms 1, 2, 3, 4 | Paper Sessions 2 |
| 20:00-22:00 | Restaurant - Poiana Brasov | Get-Together Party |

Friday, May 23

- | | | |
|-------------|-----------------------------------|--------------------|
| 08:00-20:00 | Secretariat | Late Registration |
| 08:30-10:45 | Aula | Plenary Session 2 |
| 10:45-11:00 | Lobby First Floor | Coffee Break |
| 11:00-13:00 | Rooms 1, 2, 3, 4 | Paper Sessions 3 |
| 13:00-14:00 | Lobby Second Floor | Lunch |
| 14:00-15:00 | Lobby First Floor | Dialogue Session 2 |
| 15:00-17:30 | Rooms 1, 2, 3, 4 | Paper Sessions 4 |
| 17:00-17:45 | Room 5 | IEEE Meeting |
| 18:30-19:00 | Black Church | Organ Concerto |
| 20:00-22:00 | Restaurant Cerbul Carpatin Brasov | Dinner |

Saturday, May 24

- | | | |
|-------------|------------------------------|--------------------------|
| 08:00-20:00 | Secretariat | |
| 08:30-19:00 | | Hiking Tour Bran-Pestera |
| 08:30-19:00 | | Trip to Sighisoara-Sibiu |
| 20:00-22:00 | Restaurant Aro Palace Brasov | Dinner |

Sunday, May 25

- | | | |
|-------------|--|------------------------|
| 08:00-11:00 | Secretariat | Departure Arrangements |
| 5:00-20:00 | Guests' departure to <i>Henri Coanda</i> Bucharest International Airport and
Braşov Railway Station | |

OPTIMIZATION OF ELECTRICAL AND ELECTRONIC EQUIPMENT

May, 22-24, 2008, Aula Magna "Transilvania" University of Brasov

B-dul Iuliu Maniu Nr. 52, 500091, Brasov, Romania

Topic Areas

1. Electrotechnics (Volume I, 43 papers)	Sessions
1A. Advances in Magnetic Materials (Round Table) (4 papers)	1A-1, -2
1B. Electric Circuits and Networks (2 papers)	1B-1
1C. Electromagnetic Field, Electrostatic Processes, EMC, EMI (6 papers)	1C-1, -2
1D. Applications of Electrical Engineering in Biology (4 papers)	1D -2
1E. Electromagnetic Processing of Materials (4 papers)	1E-1, -2
1F. Industrial and Commercial Power Systems (15 papers)	1F-1, -2
1G. Power Quality and Utility Applications (3 papers)	1G-1, -2
1H. Advanced Optimization Methods in Electrical Engineering (5 papers)	1H-1, -2
2-A. Power Electronics, Electrical Machines & Drives (Volume II-A, 49 papers)	
2A. Rotary Electrical Machines and Drives, Rotary Actuators (19 papers)	2A-1, -2
2B. Linear-Motion Electrical Machines and Actuators (4 papers)	2B-1, -2
2C. Power Electronics in Drives, Control in Power Electronics (10 papers)	2C-1, -2
2D. Power Electronics for Power Systems and Power Quality (5 papers)	2D-1, -2
2E. Automotive Electrical Equipment (5+1 papers)	2E-2, -2
2F. Electric, Hybrid and Fuel Cell Vehicles, Control Techniques (5 papers)	2F-1, -2
2-B Renewable Energy Conversion and Control (Volume II-B 24 papers)	
2G. Renewable Energy Conversion and Control (24 papers)	2G-1, -2
3. Industrial Automatics and Control (Volume III, 39 papers)	
3A. Control of Linear and Nonlinear Systems, Sensorless Control (9 papers),	3A-1, -2
3B. Motion Control, Drive Control, Modelling, Simulation (8 papers)	3B-1, -2
3C. Signal Processing in Industrial Automation (2 papers)	3C-1,
3D. Adaptive and Robust Control (2 papers)	3D-1, -2
3E. Neural Networks, Intelligent Systems (5 papers)	3E-1, -2
3F. Industrial Informatics (3 papers)	3F-1
3G. Communication Systems (8 papers)	3G-1, -2
3H. Safety and Reliability in Automation (2 papers)	3H -2
4. Applied Electronics, Electrical Engineering Education (Volume IV, 40 papers)	
4A. Electronic Circuits, Network Theory and Microelectronics (5 papers)	4A-1, -2
4B. Circuits and Systems (6 papers)	4B-1, -2
4C. Embedded Systems, Hardware and Software Co-Design (5 papers)	4C-1, -2
4D. Measurements, Data Acquisition and Medical Applications (6 papers)	4D-1, -2
4E. Education in Electrical Technologies (3+1 paper)	4E-1, -2
4F. Virtual and Remote Laboratories (6 papers)	4F-1
4G. Intelligent Buildings (8 papers)	4G, -2

PROGRAM AT A GLANCE (Thursday, May 22)

May 22	Rooms Schedule	Aula	Room 1	Room 2	Room 3	Room 4	
	8:30 – 10:45	Plenary Session 1 (2) (p.7)					
	11:00 – 13:00	Oral session 1 2A-1(9) (p. 8)	Oral session 2 2G-1(6) (p. 10)	Oral session 3 4A-1(2) (p. 12) 4B-1(4) (p. 12)	Oral session 4 4F-1(6) (p. 13)	Student Forum 1 (3) (p. 14)	
	Lobby first floor - Dialogue session 1						
	14:00 – 15:00	2G-2 (13), (p. 15), 3A-2 (3) (p. 18), 3B-2 (2) (p. 18), 3D-2 (1) (p. 19), 3E-2 (1) (p. 19), 3G-2 (2) (p. 19), 3H-2 (2) (p. 19), 4A-2 (3) (p. 20), 4B-2 (2) (p.20), 4C-2 (3) (p. 20), 4D-2 (1) (p. 21), 4E-2 (1)(p. 21), 4G-2 (8) (p. 21).					
	Rooms Schedule	Aula	Room 1	Room 2	Room 3	Room 4	
15:00 – 17:30	Oral session 5 2B-1(2) (p. 23) 2C-1(7) (p. 23)	Oral session 6 1F-1(6) (p. 25) 1G-1(2) (p. 26)	Oral session 7 3A-1(6) (p. 27) 3E-1(4) (p. 28)	Oral session 8 4C-1(2) (p. 29) 4D-1(5) (p. 29) 4E-1(2+1) (p. 30)	Industry News (3) (p. 31)		

PROGRAM AT A GLANCE (Friday May 23)

May 23	Rooms Schedule	Aula	Room 1	Room 2	Room 3	Room 4	
	8:30 – 10:45	Plenary Session 2 (3) (p.32)					
	11:00 – 13:00		Oral session 9 2G-1(5) (p. 33)	Oral session 10 3B-1(6) (p. 34) 3C-1(2) (p. 35)	Oral session 11 2E-1(3) (p. 36) 2F-1(3) (p. (36) 1H-1(2) (p. 37)	Student Forum 2 (3) (p. 38)	
	Lobby first floor - Dialogue session 2						
	14:00 – 15:00	1A-2(1) (p.42), 1C-2(2) (p.39), 1D-2(4) (p.39), 1E-2(1) (p.40), 1F-2(9) (p.40), 1G-2(1) (p.41), 1H-2(3) (p.42), 2A-2 (10) (p.43), 2B-2 (2) (p.44), 2C-2(3) (p.45), 2D-2 (1) (p.45), 2E-2(2+1) (p.45), 2F-2(2) (p.46)					
	Lobby first floor - Dialogue session 2						
	Rooms Schedule	Aula	Room 1	Room 2	Room 3	Room 4	
15:00 – 17:30		Oral session 12 2D-1(4) (p. 47) 1B-1(2) (p. 48)	Oral session 13 3D-1(1) (p. 49) 3F-1(3) (p. 49) 3G-1(6) (p.49)	Oral session 14 1C-1(4) (p.51) 1E-1(3) (p.52)	Round table 1A-1 (3) (p.53)		

The symbols in each cell of columns 2-5 have the following meaning:

Session code (number of papers of the session) (page number in the Conference program at which the session can be found)

OPTIM 2008

Thursday, May 22

Plenary Session 1

Vol. I, II-A, III, IV, pp. XIX-XXVIII

Room 1 8:30-10:45

Chair: Amir Mansour MIRI, Ion BOLDEA, Manfred STIEBLER

**KA.02 POWER ELECTRONICS CONTROL OF WIND ENERGY IN
(p. XXIX) DISTRIBUTED POWER SYSTEMS**

*Florin IOV, M. CIOBOTARU, Frede BLAABJERG, Fellow, IEEE,
Aalborg University, Denmark*

**KA.03 PRESENT STATE AND A FUTURISTIC VISION OF MOTOR DRIVE
(p. XLV) TECHNOLOGY**

*Mahesh SWAMY, Yaskawa Electric America, Inc., Waukegan, IL, USA
Tsuneo KUME, Yaskawa Electric Corporation, Japan*

Note: Every page of the Conference program contains at the beginning the following data: the day, the session code and topic, and the volume (there are five volumes: 1, 2-A, 2-B, 3, 4) in which the concerned papers can be found.

On the left hand of each paper title, three symbols are included vertically. The first indicates the code of the paper, the second one (in parentheses) the submission reference code, the third one (in parentheses), the page number in the volume.

OPTIM 2008

Thursday, May 22

Session 2A-1 Rotary Electrical Machines and Drives, Rotary Actuators

Vol. II-A

Aula, 11:00-13:15

Chair: Ion BOLDEA, Manfred STIEBLER, Dan IONEL

- 2A.01 EXPERIMENTAL VALIDATION OF THE DYNAMIC MODEL OF A SINGLE/TWO PHASE INDUCTION MOTOR**
(588)
(p. 3) *Adrian DANILA, Ioan MARGINEANU, Radu CAMPEANU, Constantin SUCIU,*
Transilvania University of Brasov, Romania
- 2A.03 VECTOR CONTROL OF THE SYNCHRONOUS MOTOR OPERATING AT UNITY POWER FACTOR**
(636)
(p. 15) *Csaba SZABO, Maria IMECS, Ioan Iov INCZE,*
Technical University of Cluj-Napoca, Romania
- 2A.04 FLUX LINKAGE IN TRANSVERSE FLUX MACHINES WITH FLUX CONCENTRATION**
(432)
(p. 21) *Marek SIATKOWSKI, Bernd ORLIK,* University of Bremen, Germany
- 2A.05 ANALYTICAL MODEL OF THE SYNCHRONOUS RELUCTANCE MOTOR WITH AXIALLY LAMINATED ROTOR FOR OPTIMIZATION PURPOSE**
(582)
(p. 27) *Ileana TORAC,* Romanian Academy, Timisoara Branch, Romania,
Alin ARGESSEANU, Politehnica University of Timisoara, Romania
- 2A.06 ANALYTICAL ESTIMATION OF THE ELECTRIC CURRENTS IN THE ELEMENTARY CONDUCTORS OF A ROEBEL BAR**
(581)
(p. 33) *TOMA DORDEA, ILEANA TORAC, GHEORGHE MADESCU, MARTIAN MOT,*
Lucian OCOLISAN, Romanian Academy, Timisoara Branch, Romania

(To be continued on the next page)

OPTIM 2008

Thursday, May 22

Session 2A-1 Rotary Electrical Machines and Drives, Rotary Actuators
Vol. II-A Room 1 11:00-13:15

Chair: Ion BOLDEA, Manfred STIEBLER, Dan IONEL

**2A.07 SYNCHRONOUS RELUCTANCE MACHINE WITH CONTROLLED
(395) CAPACITANCE INJECTION**

(p. 39) *Ayodeji Samson Olatunji OGUNJUYIGBE, Adisa Abdul-Ganiy JIMOH,
Dan Valentin NICOLAE,*

*Tshwane University of Technology, Pretoria, South Africa,
John Terhile AGEE, University of Botswana, Botswana*

**2A.08 IMPROVED MODEL OF SATURATED REGIONS IN MAGNETIC
(617) EQUIVALENT CIRCUITS OF HIGHLY SATURATED**

(p. 45) **ELECTROMAGNETIC DEVICES**
Ali DEIHIMI, Bu-Ali Sina University, Hamedan, Iran

**2A.09 SWITCHED RELUCTANCE MACHINE SYNTHESIS ALGORITHMS
(599) BASED ON CURRENT PWM CONTROL STRATEGY FOR MACHINE
(p. 51) DESIGN OPTIMISATION**

Ali DEIHIMI, Bu-Ali Sina University, Hamedan, Iran

OPTIM 2008

Thursday, May 22

Session 2G-1

Renewable Energy Conversion and Control

Vol. II-B

Room 1

11:00-13:00

Chair: Frede BLAABJERG, Corneliu MARINESCU, Marcian CIRSTEIA

**2G.01 SINGLE-PHASE INVERTER WITH POWER QUALITY
FEATURES FOR DISTRIBUTED GENERATION SYSTEMS**

(526)

(p. 313)

Leonardo R. LIMONGI, Radu BOJOI, Alberto TENCONI,
Politecnico di Torino, Italy,
Luminita CLOTEA, Transilvania University of Brasov, Romania

**2G.02 PARALLEL OPERATION OF VOLTAGE CONTROLLED
SOURCE INVERTER MODULES WITH EQUAL LOAD**

(322)

(p. 319)

SHARING IN SINGLE PHASE AC SYSTEMS
Emanuel SERBAN, Masautso NGOSI, Trevor MONK,
Xantrex Technology Inc., Canada

**2G.03 A SOLUTION FOR FREQUENCY CONTROL IN ISLANDED
THREE-PHASE MICRO-GRIDS SUPPLIED BY**

(554)

(p. 327)

RENEWABLE ENERGY SOURCES
Ioan SERBAN, Corneliu MARINESCU,
Transilvania University of Brasov, Romania

**2G.04 SINGLE-PHASE OPERATION OF AN AUTONOMOUS
THREE-PHASE INDUCTION GENERATOR USING A VSI-DL
CONTROL SYSTEM**

(560)

(p. 333)

Catalin Petrea ION, Ioan SERBAN, Corneliu MARINESCU,
Transilvania University of Brasov, Romania

(To be continued on the next page)

OPTIM 2008

Thursday, May 22

Session 2G-1 Renewable Energy Conversion and Control

Vol. II-B

Room 1

11:00-13:00

Chair: Frede BLAABJERG, Corneliu MARINESCU, Marcian CIRSTEA

**2G.05 POWER DISTRIBUTION IN RES-DIESEL AUTONOMOUS
(577) POWER SYSTEM WITH DOUBLY FED INDUCTION
(p. 339) GENERATOR FOR REDUCTION OF FUEL CONSUMPTION**
Włodzimierz KOCZARA Grzegorz IWANSKI, Bartłomiej KAMINSKI,
Warsaw University of Technology, Poland,
Marcian CIRSTEA, Anglia Ruskin University, United Kingdom,
Neil BROWN, Cummins Generator Technologies, United Kingdom

**2G.06 SMART AC GRID INTEGRATING DISPERSED SMALL
(638) HYDROPOWER SOURCES**
(p. 345) *Razvan MAGUREANU, Mihaela ALBU, Valeriu BOSTAN,*
Ana Maria DUMITRESCU, Politehnica University Bucharest, Romania,
Gabriela DIMU Florica POPA Mircea ROTARU,
ISPH, Bucharest, Romania

(To be continued on Friday, May 23, Room 1, 11:00-13:00)

OPTIM 2008

Thursday, May 22

Session 4A-1 Electronic Circuits and Networks, Microelectronics
Session 4B-1 Circuits and Systems

Vol. IV

Room 2

11:00-13:00

Chair: Mircea BODEA, Iuliu SZEKELY, Florin SANDU

- 4A.01 A NEW FULLY DIFFERENTIAL SECOND GENERATION CURRENT CONVEYOR AND ITS APPLICATION**
(325)
(p. 3) *Fırat KAÇAR*, Istanbul University, Turkey
Hakan KUNTMAN, Istanbul Technical University, Turkey
- 4A.02 COMMUNICATION STRATEGY AND FAULT-TOLERANCE ABILITIES DEVELOPMENT IN BIO-INSPIRED HARDWARE SYSTEMS WITH FPGA-BASED ARTIFICIAL CELL NETWORK**
(373)
(p. 9) *Csaba SZÁSZ*, *Virgil CHINDRIŞ*, Technical University of Cluj-Napoca, Romania
- 4B.03 NEURAL CONTROL BASED ON RBF NETWORK IMPLEMENTED ON FPGA**
(558)
(p. 41) *Sándor Tihamér BRASSAI*, *László BAKÓ*
Sapientia – Hungarian University of Transylvania, Târgu-Mures, Romania
Gheorghe PANÁ, *Stefan DAN*, Transilvania University of Braşov, Romania
- 4B.04 A SAMPLING METHOD FOR REDUCTION OF POWER IN BATTERY OPERATED RECEIVERS**
(566)
(p. 47) *Divya MURALI*, *Nathan IDA*, The University of Akron, USA
- 4B.05 HARDWARE IMPLEMENTATION OF DELAY-CODED SPIKING-RBF NEURAL NETWORK FOR UNSUPERVISED CLUSTERING**
(608)
(p. 51) *Laszlo BAKO*, *Sandor Tihamér BRASSAI*, *Miklós Attila BACZÓ*
Sapientia – Hungarian University of Transylvania, Târgu-Mures, Romania
Iuliu SZÉKELY, Transilvania University of Braşov, Romania
- 4B.06 RECONFIGURABLE COMPUTING SOLUTION FOR PEPTIDE MASS FINGERPRINTING**
(652)
(p. 57) *Istvan BOGDAN*, *Daniel COCA*, University of Sheffield, UK
Robert J. BEYNON, University of Liverpool, UK

OPTIM 2008

Thursday, May 22

Session 4F-1

Virtual and Remote Laboratories

Vol. IV

Room 3

11:00-13:00

Chair: Gheorghe SCUTARU, Petru TODOS, Yusuf ALTUN

4F.1 AN EDUCATIONAL VIRTUAL LABORATORY FOR SLIDING MODE AND PID CONTROL OF INVERTED PENDULUM

(367)

(p. 149) *Metin DEMIRTAS, Yusuf ALTUN, Ayhan ISTANBULLU*

Balikesir University, Turkey

4F.2 DISTANCE LABORATORY APPLICATIONS ERRL: A STUDY ON RADIO COMMUNICATION IN ELECTRONIC FIELD

(402)

(p. 157) *Cansu Çiğdem AYDIN, Güzin TÜRKMEN, Erdem ÖZYURT, Elif Uray AYDIN, Nergiz Erçil ÇAĞILTAY, Mehmet Efe ÖZBEK, Ali KARA*

Atılım University, Ankara, Turkey

Nimet Ceren ALPARSLAN, Bilkent University, Ankara, Turkey

4F.3 NEW INFORMATIC SYSTEM OF INTERACTIVE TRAINING FOR VIRTUAL LABORATORY TYPE APPLICATIONS

(403)

(p. 163) *Codrin DONCIU, Cristian DOSOFTEI*

Gheorghe Asachi Tehnical University of Iasi, Romania

4F.4 THE FIRST YEAR CURRICULUMS OF ELECTRICAL-ELECTRONICS ENGINEERING DEPARTMENTS IN TURKEY

(512)

(p. 169) *Yusuf ALTUN, Metin DEMIRTAS, Ayhan ISTANBULLU*

Balikesir University, Turkey

4F.5 INDIVIDUALIZED LEARNING ENHANCED BY VIRTUAL REALITY

(627)

(p. 175) *Gheorghe SCUTARU, Florin SANDU, Dominic KRISTALY*

Transilvania University of Braşov, Romania

Anna Marina SCAPOLLA, University of Genova, Italy

Massimo MUSTICA, Laboratorio delle Idee s.a.s., Fabriano, Italy

4F.6 REMOTE EXPERIMENTS IN EDUCATION: A SURVEY OVER DIFFERENT PLATFORMS AND APPLICATION FIELDS

(649)

(p. 181) *Vassilis KOLIAS, Eleftherios KAYAFAS*

National Technical University of Athens, Greece

Ioannis ANAGNOSTOPOULOS, University of Aegean, Greece

OPTIM 2008

Thursday, May 22

Session SF-1

Student Forum 1

Room 4 11:00-13:00

Chair: Teodor PANA, Ali DEIHIMI, Mihai ROMANCA

SF.01 MASTER STUDIES ON THE AALBORG UNIVERSITY

Remus TEODORESCU, Prof. Dr. Eng., Member, IEEE,
Aalborg University, Denmark

SF.02 MASTER STUDIES IN ILMENAU, PRACTICAL PLACEMENTS IN THÜRINGEN

Frank MARCH, Dr. Eng., Director Marketing and Student Affairs,
Ilmenau University of Technology, Germany

SF.03 ADVANCES IN POWER ELECTRONICS FOR STUDENTS

Michael BRAUN, Prof. Dr.-Ing., Elektrotechnisches Institut,
Universität Karlsruhe (TH), Forschungsuniversität, Germany

OPTIM 2008

Thursday, May 22

Dialogue Session 1

Vol. II-B

Lobby First Floor

14:00-15:00

- 2G.11 ON THE MAXIMIZATION OF A COST-EFFECTIVE PV SIZING;
(530) TOWARDS AN INTELLIGENT BUILDING**
(p. 375) *Socrates KAPLANIS, E. KAPLANI, Ermis-Adonis DAVISKAS,*
Technological Educational Institute of Patras, Greece.
- 2G.12 FROM A MANUALLY DRIVEN STAND ALONE PV PLANT TO A
(354) REMOTELY MONITORED AND INTELLIGENTLY MANAGED
(p. 383) ONE**
Socrates KAPLANIS, E. KAPLANI, Ermis-Adonis DAVISKAS,
Technological Educational Institute of Patras, Greece,
Daniela MARINESCU, Transilvania University of Brasov, Romania
- 2G.14 A NOVEL INTEGRATED RENEWABLE ENERGY SYSTEM
(362) MODELLING APPROACH, ALLOWING FAST FPGA
(p. 395) CONTROLLER PROTOTYPING,**
Alberto Parera RUIZ, Anglia Ruskin University, United Kingdom,
Marcian CIRSTEA, Anglia Ruskin University, United Kingdom,
Wlodzimierz KOCZARA, Warsaw University of Technology, Poland,
Remus TEODORESCU, Aalborg University, Denmark
- 2G.15 A NOVEL FPGA FUEL CELL SYSTEM CONTROLLER DESIGN
(363) KRESIMIR PETRINEC,**
(p. 401) *University of California, Los Angeles, United States of America,*
Marcian CIRSTEA, Anglia Ruskin University, United Kingdom,
Karl SEARE, Sustainable Technology Solutions Ltd., United Kingdom,
Corneliu MARINESCU, Transilvania University of Brasov, Romania
- 2G.16 STAND-ALONE WIND SYSTEM WITH VANADIUM REDOX
(513) BATTERY ENERGY STORAGE**
(p. 407) *Luminita BAROTE, Transilvania University of Brasov, Romania,*
Robert WEISSBACH, Penn State Erie, United States of America,
Remus TEODORESCU, Aalborg University, Denmark,
Corneliu MARINESCU, Transilvania University of Brasov, Romania,
Marcian CIRSTEA, Anglia Ruskin University, United Kingdom.

(To be continued on the next page)

OPTIM 2008

Thursday, May 22

Dialogue Session 1

Vol. II-B

14:00-15:00

Lobby First Floor

- 2G.17 OPTIMAL DESIGN OF A RELIABLE HYDROGEN-BASED STAND-ALONE WIND/PV GENERATION SYSTEM**
(381)
(p. 413) *Ali Kashefi KAVIANI, Gholam Hossein Riahy DEHKORDI, Shahram Montaser KOUHSARI,*
Amirkabir University of Technology, Islamic Republic of Iran.
- 2G.18 POWER FLOW CONTROL ON WIND POWER PLANT WITH PERMANENT MAGNET SYNCHRONOUS GENERATOR,**
(655)
(p. 419) *Liviu MODRAN,* "L. Blaga" University of Sibiu, Romania.
- 2G.19 MPPT FOR VOLTAGE CONTROLLED PV INVERTER,**
(584)
(p. 427) *Tamas KEREKES,* Aalborg University, Denmark,
Remus TEODORESCU, Aalborg University, Denmark,
Rosa MASTROMAURO, Marco LISERRE, Antonio DELL'AQUILA,
Politecnico di Bari, Italy
- 2G.20 PV INVERTER TEST SETUP FOR EUROPEAN EFFICIENCY, STATIC AND DYNAMIC MPPT EFFICIENCY EVALUATION**
(535)
(p. 433) *Massimo VALENTINI, Alin RADUCU, Dezso SERA,*
Remus TEODORESCU, Aalborg University, Denmark
- 2G.21 ON A NEW CYCLOIDAL PLANETARY GEAR USED TO FIT MECHATRONIC SOLAR TRACKERS**
(630)
(p. 439) *Mircea NEAGOE, Dorin Valentin DIACONESCU, Codruta JALIU,*
Transilvania University of Brasov, Romania,
Lucia PASCALE, "Valahia" University of Targoviste, Romania,
Radu SAULESCU, Sorin SISCA,
"Transilvania" University of Brasov, Romania
- 2G.22 PV TRACKING DATA NEEDED IN THE OPTIMAL DESIGN OF THE AZIMUTHAL TRACKER'S CONTROL PROGRAM**
(624)
(p. 449) *Ion VISA, Dorin Valentin DIACONESCU, Anca DUTA, Valentina POPA,*
Transilvania University of Brasov, Romania.

(To be continued on the next page)

OPTIM 2008

Thursday, May 22

Dialogue Session 1

Vol. II-B

Lobby First Floor

14:00-15:00

**2G.23 PV ORIENTATION DATA NEEDED IN THE DESIGN OF THE
(625) PSEUDO-EQUATORIAL TRACKER'S CONTROL PROGRAM,**
(p. 455) *Dorin Valentin DIACONESCU, Ion VISA, Bogdan Gabriel BURDUHOS,
Radu SAULESCU, Transilvania University of Brasov, Romania.*

**2G.24 ANATASE (TiO₂) THIN LAYERS FOR SOLAR ENERGY
(545) CONVERSION**
(p. 461) *Anca DUTA, Transilvania University of Brasov, Romania,
Maria VISA, College for Natural Sciences, Brasov, Romania,
Simona Ana MANOLACHE,
Transilvania University of Brasov, Romania,
Marian NANU,*
Advanced Surface Technologies AST, Delft, The Netherlands.

OPTIM 2008

Thursday, May 22

Dialogue Session 1

Vol. III

Lobby First Floor

14:00-15:00

- 3A.07 CONTROL OF A DYNAMIC NONLINEAR/ UNCERTAIN SYSTEM VIA A VARIABLE STRUCTURE SYSTEM APPROACH**
(546)
(p. 45) *Florin MOLDOVEANU, Dan FLOROIAN, Cristian BOLDISOR, Transilvania University of Brasov, Romania*
Jan VITTEK, University of Zilina, Slovak Republic
Sergey RYVKIN, Trapeznikov Institute of Control Sciences of Russian Academy of Sciences, Moscow, Russia
- 3A.08 CHOOSING SUITABLE VARIATIONS OF DIFFERENTIAL EVOLUTION AND PARTICLE SWARM OPTIMIZATION FOR THE OPTIMIZATION OF A PI CASCADE CONTROL**
(369)
(p. 55) *Karia ZIELINSKI, Matthias JOOST, Rainer LAUR, Bernd ORLIK, University of Bremen, Germany*
- 3A.09 CONTROL METHODS ON UNSTABLE PERIODIC ORBITS OF A CHAOTIC DYNAMICAL SYSTEM – CONTROL CHAOS IN BUCK CONVERTER**
(419)
(p. 63) *Cosmin IVAN, Petrom S.A., Pitesti, Romania*
Alexandru SERBANESCU, Military Technical Academy, Bucharest, Romania
- 3B.07 COMPLETE HARDWARE / SOFTWARE SOLUTION FOR IMPLEMENTING THE CONTROL OF THE ELECTRICAL MACHINES WITH PROGRAMMABLE LOGIC CIRCUITS**
(387)
(p. 107) *Daniel MIC, Stefan ONIGA, C. LUNG, North University of Baia Mare, Romania*
Emil MICU, Transilvania University of Brasov, Romania
- 3B.08 CHATTERING FREE SLIDING MODE CONTROL LAW FOR THE DRIVE EMPLOYING PMSM POSITION CONTROL**
(533)
(p. 115) *Jan VITTEK, Peter Briš, Marek ŠTULRAJTER, P. MAKYS, University of Zilina, Slovak Republic*
Vasile COMNAC, Mihai CERNAT, Transilvania University of Brasov

OPTIM 2008

Thursday, May 22

Dialogue Session 1

Vol. III

Lobby First Floor

14:00-15:00

- 3D.01 NEW ADAPTIVE CONTROLLER IN A TWO AREA HVAC/HVDC POWER SYSTEM**
(572)
(p. 131) *Mohammad BAYATI POUDEH, Mehdi MAHDAVIAN*
Islamic Azad University, Naein Branch, Isfahan, Iran
- 3E.05 DAMPING SUB-SYNCHRONOUS OSCILLATIONS OF A POWER SYSTEM USING ANN-BASED CONTROLLED SVC**
(506)
(p. 167) *Mahmood JOORABIAN, Morteza RAZZAZ, Mazdak EBADI, Mahmood MOGHADDASIAN*, Shahid Chamran University, Iran
- 3G.07 MANAGEMENT SYSTEM OF THE PRODUCTS ON WARRANTY BASED ON RFID TECHNOLOGIES**
(341)
(p. 231) *Cristina HURJUI, Cornel TURCU, Adrian GRAUR Stefan cel Mare University of Suceava, Romania*
- 3G.08 RELIABLE MULTICAST PROTOCOLS FOR WIRELESS NETWORKS**
(644)
(p. 237) *Mugur MARTINESCU, Francisc SISAK*
Transilvania University of Brasov, Romania
- 3H.01 SOFTWARE RELIABILITY ESTIMATION IN THE POWER PROCESS MANAGEMENT**
(492)
(p. 243) *Simona COMAN, Transilvania University of Brasov, Romania Ionut Raul PACUREANU, SC ELECTRICA SA SDFEE Brasov, Romania*
- 3H.02 APPLICATION OF ANALYTIC METHOD IN THE EVALUATION OF INDUCTION MOTORS BEARINGS' RELIABILITY**
(663)
(p. 249) *Mirela Melania FILIP*
The National Developing Centre of the Vocational and Technical Education, Bucharest, Romania
Doru LUCULESCU
Henri Coandă Academy of Air Forces, Brasov, Romania

OPTIM 2008

Thursday, May 22

Dialogue Session 1

Vol. IV

Lobby First Floor

14:00-15:00

- 4A.03 ARTIFICIAL MOLECULE DEVELOPMENT MODEL FOR GENES IMPLEMENTATION IN BIO-INSPIRED HARDWARE SYSTEMS**
(374)
(p. 15) *Csaba SZÁSZ, Levente CZUMBIL*
Technical University of Cluj-Napoca, Romania
- 4A.04 SMALL SIGNAL LINEAR CIRCUIT PARAMETER EXTRACTION METHOD USING SYMBOLIC COMPUTATION**
(580)
(p. 21) *Cristian Ferruccio ZORIO*
SRTV, Politehnica University of Bucharest, Romania
Mircea BODEA, Ioan RUSU, Politehnica University of Bucharest, Romania
- 4A.05 TOTAL TRANSCONDUCTANCE OPTIMIZATION FOR A RAIL TO RAIL AMPLIFIER**
(622)
(p. 25) *Andrei DANCHIV*
Infineon Technologies Romania, Bucharest, Romania
Mircea BODEA, Claudius DAN
Politehnica University of Bucharest, Romania
- 4B.01 OPTIMIZING FPGA IMPLEMENTATION OF FEED-FORWARD AND NEURAL NETWORKS**
(340)
(p. 31) *Stefan ONIGA, Alin TISAN, Daniel MIC, Attila BUCHMAN, Andrei VIDA-RATIU*
North University, Baia Mare, Romania
- 4B.02 POWER OPTIMIZATION OF LUT BASED FPGA CIRCUITS**
(350)
(p. 37) *Morteza MASHAYEKHI, Zahra JEDDI, Esmail AMINI*
Islamic Azad University, Karaj Branch, Karaj, Iran
- 4C.01 EMBEDDED SYSTEM DESIGN FOR FIELD-ORIENTATED STEPPER MOTOR CONTROL**
(491)
(p. 63) *Calin RUSU, Enikő SZÖKE*
Technical University of Cluj-Napoca, Romania

(To be continued on the next page)

OPTIM 2008

Thursday, May 22

Dialogue Session 1

Vol. IV

Lobby First Floor

14:00-15:00

- 4C.02 AN EFFICIENT ALGORITHM FOR ONLINE PLACEMENT IN A RECONFIGURABLE SYSTEM**
(508)
(p. 69) *Mohammad ESMAEILDOUST, Mahmood FAZLALI, Ali ZAKEROLHOSSEINI*
Shahid Beheshti University Tehran, Iran
- 4C.04 FPGA IMPLEMENTATION OF A SELF-ORGANIZED MAP WITH ON-CHIP LEARNING**
(618)
(p. 81) *Alin Sasa TISAN, Stefan ONIGA, Ciprian GAVRINCEA, Attila BUCHMAN*
North University of Baia Mare, Romania
- 4D.06 OPTICAL DISC DETECTION IN RETINAL IMAGES**
(542)
(p. 119) *Mihai IVANOVICI, Veronica SCURTU*
Transylvania University of Brasov, Romania
- 4E.03 DIGITAL SIMULATION OF INDUCTION AND PERMANENT MAGNET SYNCHRONOUS MOTOR STARTING**
(654)
(p. 139) *Liviu MODRAN, "Lucian Blaga" University of Sibiu, Romania*
- 4G.01 METHODS OF INVESTIGATING CONSTRUCTION MATERIALS USED FOR INTELLIGENT BUILDING SHIELDING**
(502)
(p. 191) *Mihai ROMANCA, Petre OGRUTAN, Lia-Elena ACIU, George NICOLAE*
Transylvania University of Brasov
- 4G.02 SYSTEM FOR PHOTOVOLTAIC PANELS CONNECTIONS USED IN AN EXPERIMENTAL SOLAR POWER GENERATOR**
(555)
(p. 197) *Dorin PETREUS, Petru MOLNAR, Mircea PASCALAU*
Technical University of Cluj-Napoca, Romania
- 4G.03 FUZZY CONTROLLER FOR A SHADED DAYLIGHTING SYSTEM**
(586)
(p. 203) *Andrei CZIKER, Mircea CHINDRIS, Anca MIRON*
Transylvania University of Brasov, Romania

(To be continued on the next page)

OPTIM 2008

Thursday, May 22

Vol. IV

Dialogue Session 1

Lobby First Floor

14:00-15:00

4G.04 A SIMPLIFIED HYBRID (WIRED – WIRELESS) ARCHITECTURE FOR DATA AND ENTERTAINMENT DISTRIBUTION IN INTELLIGENT HOUSES
(596)
(p. 209)

Radu ARSINTE, Technical University of Cluj-Napoca, Romania

4G.05 MULTIMEDIA INTERFACES IN THE CONTROL PROCESS OF SMART BUILDINGS USING 3D SCENES, FLASH, ANIMATIONS AND RELATIONAL DATABASES
(610)
(p. 213)

Muguras MOCOFAN, Radu VASIU, Marian BUCOS, Mihai ONITA, Iasmina ERMALA, Politehnica University of Timisoara, Romania

4G.06 PRELIMINARY IMPLEMENTATION OF “BIDIRECTIONAL FORWARDING DETECTION” PROTOCOL FOR UNICAST AND MULTICAST
(631)
(p. 217)

Alexandru-Florin GABOR, Virgil DOBROTA, Tudor BLAGA
Technical University of Cluj-Napoca, Romania

4G.07 A NOVEL PROCEDURE AND APPARATUS FOR MEASURING THE RADON CONCENTRATION IN AIR
(635)

(p. 221) *Gheorghe MORARIU, Petre OGRUȚAN, Csaba-Zoltán KERTÉSZ, Marian ALEXANDRU, Gheorghe PANA*
Transilvania University of Brasov, Romania

4G.08 REMOTE AND MOBILE CONTROL IN DOMOTICS

(643) *Florin SANDU, Mihai ROMANCA, Adrian NEDELUCU, Paul BORZA*
(p. 225) *Transilvania University of Brasov, Romania*
Rozalina DIMOVA, Technical University of Varna, Bulgaria

OPTIM 2008

Thursday, May 22

Session 2B-1 Linear-Motion Electrical Machines and Drives

Session 2C-1 Power Electronics in Drives, Control in Power Electronics

Vol. II-A

Aula

15:00-17:30

Chair: Ion BOLDEA, Teresa ORLOWSKA-KOWALSKA, Mihai CISTELECAN

- 2B.01 PASSIVE AND ACTIVE CONSTANT FORCE-DISPLACEMENT CHARACTERISTICS AND OPTIMIZATION OF A LONG-STROKE LINEAR ACTUATOR**
(434)
(p. 117) *Laurentiu ENCICA, Johannes PAULIDES, Elena LOMONOVA, Eindhoven University of Technology, The Netherlands*
- 2B.02 IMPROVED APPLICATION OF RESONANT CONTROLLERS FOR COMPENSATION OF COGGING FORCE RIPPLE IN LONG-STATOR PERMANENT-MAGNET LINEAR MACHINES**
(412)
(p. 125) *Rodrigo BENAVIDES, Peter MUTSCHLER, Darmstadt University of Technology, Germany*
- 2C.01 IMPROVED CONTROL SCHEME FOR THREE PHASE PWM AC/DC CONVERTER UNDER UNBALANCED VOLTAGE DIPS CONDITION**
(351)
(p. 143) *Daniel ROIU, Radu BOJOI, Giovanni GRIVA, Politecnico di Torino, Italy*
- 2C.02 A 2D-HYSTERESIS CURRENT CONTROL FOR A THREE PHASE VOLTAGE SOURCE INVERTER**
(344)
(p. 149) *Hans-Juergen PFISTERER, DRIVE-CONSULT, Munchen, Germany, Olaf SIMON, SEW EURODRIVE, Bruchsal, Germany*
- 2C.03 A NOVEL METHOD FOR ONLINE STATOR RESISTANCE ESTIMATION OF INVERTER-FED AC-MACHINES WITHOUT TEMPERATURE SENSORS**
(446)
(p. 155) *Juriy PLOTKIN, Manfred STIEBLER, Dominik SCHUSTER, Technical University of Berlin, Germany*
- 2C.04 “ACTIVE FLUX” ORIENTATION VECTOR SENSORLESS CONTROL OF IPMSM**
(378)
(p. 161) *Ion BOLDEA, Mihaela Codruta PAICU, Gheorghe Daniel ANDREESCU, University Politehnica of Timisoara, Romania, Frede BLAABJERG, Aalborg University, Denmark*

(To be continued on the next page)

OPTIM 2008

Thursday, May 22

Session 2B-1 Linear-Motion Electrical Machines and Drives

Session 2C-1 Power Electronics in Drives, Control in Power Electronics

Vol. II-A

Aula

15:00-17:30

Chair: Ion BOLDEA, Teresa ORLOWSKA-KOWALSKA, Mihai CISTELECAN

**2C.05 STABILITY ANALYSIS OF NONLINEAR VOLTAGE INVERTER
(516) INDUCTION MOTOR SYSTEM**

(p. 169) *Dumitru STANCIU, Adriana FLORESCU, Dan Alexandru STOICHESCU,*
Politehnica University of Bucharest, Romania

**2C.06 SMALL SPEED ASYMPTOTIC STABILITY STUDY OF AN INDUCTION
(400) MOTOR SENSORLESS SPEED CONTROL SYSTEM WITH EXTENDED
(p. 175) LUEMBERGER ESTIMATOR**

Teodor-Crisan PANA, Technical University of Cluj-Napoca, Romania
Olimpiu STOICUTA, University of Petrosani, Romania

**2C.07 A NEW ALGORITHM AND DEVICE FOR ABSOLUTE LINEAR
(549) ENCODERS DEDICATED TO LONG DISTANCE APPLICATIONS**

(p. 181) *Alin ARGESANU, Dorin POPOVICI, Octavian CORNEA,*
University Politehnica of Timisoara, Romania,
Ileana TORAC, Romanian Academy-Timisoara Branch, Romania

OPTIM 2008

Thursday, May 22

Session 1F-1 Industrial and Commercial Power Systems. Protection. Earthing. Rural Electric Power

Vol. I

Room 1

15:00-17:30

Chair: Ivan YATCHEV, Elena HELEREA, Dumitru TOADER

- 1F.01 TRANSIENT ANGULAR STABILITY OF THREE PARALLEL
(490) CONNECTED SYNCHRONOUS GENERATORS WITH LARGE LOAD
(p. 131) CHANGES AND CONTROL OF ACTIVE AND REACTIVE POWER.**

Amir Mansour MIRI, University of Karlsruhe, Germany.

- 1F.02 HIGH-VOLTAGE SUBSTATIONS WITH RIGID CONDUCTORS -
(507) FULL-SCALE SHORT-CIRCUIT TESTS AND COMPARATIVE FEM
(p. 137) STUDIES ON CONNECTIONS WITH SO-CALLED ELBOW
BENDS.**

*Norbert STEIN, FGH Forschungsgemeinschaft für Elektrische Anlagen und
Stromwirtschaft, Germany,
Amir Mansour MIRI, University of Karlsruhe, Germany.*

- 1F.03 ARTIFICIAL NEURAL NETWORKS IN THE VOLTAGE CONTROL OF
(427) ELECTRICAL POWER SYSTEMS.**

*(p. 143) Renato TEIXEIRA, Marley VELLASCO,
Pontifical Catholic University of Rio de Janeiro, Brazil.*

- 1F.04 POWER NETWORK CURRENT PROTECTION BASED ON A
(551) PREDICTIVE ALGORITHM.**

*(p. 149) Carol ZOLLER, Remus DOBRA, University of Petrosani, Romania,
Mihai CERNAT, "Transilvania" University of Brasov, Romania.*

- 1F.05 STAND-ALONE POWER SYSTEM WITH SYNCHRONOUS AND
(579) ASYNCHRONOUS GENERATORS.**

*(p. 155) Marius BABESCU, Calin Horia CHIOREANU,
University Politehnica of Timisoara, Romania.*

- 1F.06 EXPERIMENTAL STUDY ON THE LARGE POWER TRANSFORMER
(326) UNIT TEMPERATURE VARIATION.**

*(p. 161) Traian CHIULAN, S.C. ICEMERG S.A., Bucharest, Romania,
Brandusa PANTELIMON, Politehnica University of Bucharest,
Romania.*

(To be continued on the next page)

OPTIM 2008

Thursday, May 22

Session 1G

Power Quality and Utility Application

Vol. I

Room 1

15:00-17:30

Chair: Ivan YATCHEV, Elena HELEREA, Dumitru TOADER

**1G.01 VOLTAGE UNBALANCED MITIGATION USING A DISTRIBUTED
(587) GENERATOR.**

(p. 221) *Andrei CZIKER, Mircea CHINDRIS, Anca MIRON,*
Technical University of Cluj-Napoca, Romania.

**1G.02 CONTROL OF A THREE-PHASE FOUR-WIRE SHUNT-ACTIVE
(619) POWER FILTER BASED ON DC-BUS ENERGY REGULATION**

(p. 227) *Pedro RODRIGUEZ, Álvaro LUNA,*
Technical University of Catalonia, Barcelona, Spain,
Remus TEODORESCU, Frede BLAABJERG, Aalborg University, Denmark,
Marco LISERRE, Politechnic of Bari, Italy

OPTIM 2008

Thursday, May 22

Session 3A-1 Control of Linear and Nonlinear Systems, Sensorless Control

Vol. III

Room 2

15:00-17:30

Chair: Marley VELLASCO, Sergey RYVKIN, Corneliu LAZAR

3A.01 NONLINEAR PREDICTIVE CONTROL BASED ON NARMAX MODELS

(651) *Lianjun BAI, Daniel COCA,*

(p. 3) University of Sheffield, UK

3A.02 NOVEL MOTION SENSORLESS CONTROL OF HIGH-SPEED

(368) **SMALL-POWER SURFACE MOUNT PMSM DRIVES: WITH
EXPERIMENTS**

Răzvan ANCUȚI, Ioan BOLDEA, Gheorghe-Daniel ANDREESCU

University Politehnica of Timișoara, Romania

Dorin ILES-KLUMPNER

ebm-papst St. Georgen GmbH & Co. KG, St. Georgen, Germany

**3A.03 OPTIMIZATION OF THE TWO-MASS DRIVE DYNAMICS USING
DIFFERENT COMPENSATION FEEDBACKS**

(543) *Krzysztof SZABAT, Teresa ORLOWSKA-KOWALSKA*

(p. 19) Wrocław University of Technology, Wrocław, Poland

3A.04 THREE-LEVEL INVERTER DRIVE WITH SLIDING MODE CONTROL

(384) *Sergey RYVKIN*

(p. 25) Trapeznikov Institute of Control Sciences of Russian Academy of Sciences,
Moscow, Russia

Richard SCHMIDT-OBERMÖLLER, Andreas STEIMEL

Ruhr University Bochum, Germany

**3A.05 IMPROVED LARGE SIGNAL PERFORMANCE OF
LINEAR-CONTROLLED INPUT-SERIES AND OUTPUT-PARALLEL
DC-DC CONVERTER USING GENETIC ALGORITHM OPTIMIZATION**

(613) *Seyed Mostafa KHAZRAEI, Ashkan Mohammad Zadeh JASOUR, A. RAHMATI,
Adib ABRISHAMIFAR,* Iran University of Science and Technology, Tehran, Iran

**3A.06 EVALUATION OF TWO POSITION ACQUISITION SYSTEMS FOR
PERMANENT MAGNET LINEAR MOTORS WITH PASSIVE MOVERS**

(659) *Marius MIHALACHI, Peter MUTSCHLER*
(p. 37) Darmstadt University of Technology, Germany

(To be continued on the next page)

OPTIM 2008

Thursday, May 22

Session 3E-1

Neural Networks, Intelligent Systems

Vol. III

Room 2

15:00-17:30

Chair: Marley VELLASCO, Sergey RYVKIN, Corneliu LAZAR

- 3E.01 THE DUAL DIAGNOSIS OF AN AIRPLANE COMMAND**
(338) *Octavian GRIGORE-MULER*, University *Politehnica* Bucharest, Romania
(p. 143)
- 3E.02 A NEW INVARIANT SET FOR VIDEO PATTERN RECOGNITION IN ATR SYSTEMS**
(503) *Julian Constantin VIZITIU, Cristian MOLDER, Adrian RADU, Doru MUNTEANU*, Military Technical Academy, Bucharest, Romania
(p. 149)
- 3E.03 INCREMENTAL/DECREMENTAL SVM FOR FUNCTION APPROXIMATION**
(658) *Honorius GALMEANU, Răzvan ANDONIE*
Transilvania University of Brasov, Romania
(p. 155)
- 3E.04 ARTIFICIAL NEURAL NETWORK AND PID BASED CONTROL SYSTEM FOR DC MOTOR DRIVES**
(569) *Andrei COZMA, Dan PITICA*, Tehnical University of Cluj Napoca, Romania
(p. 161)

OPTIM 2008

Thursday, May 22

Session 4C-1 Embedded Systems, Hardware and Software Co-Design
Session 4D-1 Measurements, Data Acquisition and Medical Applications
Session 4E-1 Education in Electrical Technologies

Vol. IV

Room 3

15:00-17:30

Chair: Iuliu SZEKELY, Mihaela MOREGA, Leo ILKKO

4C.03 SPEED-OPTIMIZED FINGERPRINT IMAGE ENHANCEMENT FOR EMBEDDED SYSTEMS

(559)

(p. 75) *Csaba-Zoltán KERTÉSZ, Transilvania University of Braşov, Romania*

4C.05 PERFORMANCE REQUIREMENTS OF THE MOJETTE TRANSFORM FOR INTERNET DISTRIBUTED DATABASES AND IMAGE PROCESSING

(634)

(p. 87) *József VÁSÁRHELYI, Péter SERFÖZŐ, University of Miskolc, Miskolc, Hungary*
Péter SZOBOSZLAI, Ericsson Hungary, Budapest, Hungary
Jan TURÁN, Technical University of Kosice, Slovakia

4D.01 MULTIPLE SYNCHRONOUS DETECTION METHOD FOR MEASURING NON-LINEAR AND STATIC RESISTANCE

(416)

(p. 93) *Radu MUNTEANU jr., Gheorghe TODORAN, Romul COPÂNDEAN*

Technical University of Cluj-Napoca, Romania

4D.02 DESIGN AND OPTIMIZATION OF AN OPEN STRIPLINE RESONATOR FOR RUBBER THICKNESS GAUGING

(567)

(p. 97) *Nathan IDA, Omar BHUIYA, The University of Akron, Akron, USA*

4D.03 REMOTE AUTOMATED SYSTEM FOR NANOWIRE ELECTRODEPOSITION

(607)

(p. 101) *Cristian ZET, Catalin DAMLIAN, Cristian FOSALAU*

Technical University "Gh. Asachi", Iasi, Romania

Ionut ENCULESCU, INCDFM Magurele, Magurele, Romania

4D.04 AN RFID-BASED PILGRIM IDENTIFICATION SYSTEM (A PILOT STUDY)

(493)

(p.107) *Mohamed MOHANDES*

King Fahd University of Petroleum and Minerals, Dhahran, Saudi Arabia

(To be continued on the next page)

OPTIM 2008

Thursday, May 22

Session 4C-1 Embedded Systems, Hardware and Software Co-Design

Session 4D-1 Measurements, Data Acquisition and Medical Applications

Session 4E-1 Education in Electrical Technologies

Vol. IV

Room 3

15:00-17:30

Chair: Iuliu SZEKELY, Mihaela MOREGA, Leo ILKKO

4D.05 ESTIMATION OF NOISE IN ECG SIGNALS USING WAVELETS

(327) *Cristina STOLOJESCU*

(p. 113) *Politehnica University of Timisoara, Romania*

4E.01 TEACHING SYNCHRONOUS MACHINES BY FINITE ELEMENT MODELS

(523) *Petrica TARAS, Virgiliu FIRETEANU*

Politehnica University of Bucharest, Romania

4E.02 THE PROJECTING OF QUALIFICATION FRAMEWORK FOR ENGINEERING DOMAINS

(524) *Petru TODOS, Stela TICUL*

Technical University of Moldova, Chisinau, Republic of Moldova

4E.04 PREPARATION OF STUDENTS FOR PROFESSIONAL CAREER BY PRACTICAL PLACEMENTS. THURINGIAN EXPERIENCE

Frank MARCH, Ilmenau University of Technology, Germany

OPTIM 2008

Thursday, May 22

Industry News

Room 3 15:00-17:30

Chair: Dan NECSULESCU, Andrew KINGSTON, Alexandru MOREGA

IN.01 LECROY OSCILLOSCOPES - FROM MEASUREMENT TO ANALYSIS

Iosif BORCSA, ARC Brasov (www.arc.ro)

IN.02 TESTING SYSTEMS FOR ELECTRONIC DEVICES

Cecilia BADITA, SARTOROM IMPEX SRL Bucharest, Brasov Office,
(www.sartorom.ro)

**IN.03 SIEMENS NEWS IN THE FIELD OF DISTANCE DATA TRANSMISSION.
EDUCATIONAL LABORATORIES BASED ON SIEMENS
FRAMEWORKS**

Razvan IOACHIM, Siemens SRL A&D AS, Bucharest (w1.siemens.com).

Friday, May 23

Plenary Session 2

Vol. I, II-A, III, IV, pp. XIX-XXVIII

Room 1

8:30-10:45

Chair: Frede BLAABJERG, Ion BOLDEA, Mahesh SWAMY

KA.01 THE EMERGING ROLE OF DEAD-BEAT, DIRECT TORQUE AND FLUX CONTROL IN THE FUTURE OF INDUCTION MACHINE DRIVES

(p. XIX) *Robert D. LORENZ, Fellow, IEEE,*
University of Wisconsin-Madison, USA.

KA.04 AUTOMOTIVE SAFETY SYSTEMS AND TRENDS: THE TRW PERSPECTIVE

Andrew KINGSTON, TRW Automobile Safety Systems, Koblenz, Germany

KA.05 SMALL COMPRESSOR ELECTRIC MOTOR TECHNOLOGIES: EMBRACO'S PERSPECTIVE.

Irineu Henrique SETTER, Empresa Brasileira de Compressores S/A (EMBRACO), Joinville, Brasil.

[Jan ONDRA, Peter JANECKO](#), Embraco Slovakia.

Note: Every page of the Conference program contains at the beginning the following data: the day, the session code and topic, and the volume (there are 4 volumes) in which the concerned papers can be found.

In the left hand of each paper title, three symbols are included vertically. First indicates the code of the paper, the second one (in parentheses) the submission reference code, the third one (in parentheses), the page number in the volume.

OPTIM 2008

Friday, May 23

Session 2G-1 Renewable Energy Conversion and Control

Vol. II-B

Room 1

11:00-13:00

Chair: Remus TEODORESCU, Corneliu MARINESCU, Marcian CIRSTEA

2G.07 PROBABILISTIC TECHNIQUES FOR NETWORK ASSESSMENT

(637) **WITH SIGNIFICANT WIND GENERATION**

(p. 351) *Michael CONLON, Asim MUMTAZ, Michael FARRELL,*
Dublin Institute of Technology, Ireland,
Edward SPOONER, E.M. Renewables Ltd, United Kingdom.

2G.08 SINGLE-PHASE POWER CONDITIONER WITH REDUCED (591) LOW-FREQUENCY CURRENT RIPPLE FOR FUEL CELLS IN (p. 357) DISTRIBUTED GENERATION APPLICATIONS

Adriano BOLLERO, Marco BOLLERO, ENERCONV s.r.l, Italy,
Cesare PICA, Leonardo LIMONGI, Alberto TENCONI,
Politecnico di Torino, Italy

2G.09 STUDY OF A GRID-CONNECTED HYBRID WIND/MICRO- (548) HYDRO POWER SYSTEM,

(p. 363) *Stefan BREBAN,* Technical University of Cluj-Napoca, Romania,
Mehdi NASSER, Arnaud VERGNOL, Vincent COURTECUISSÉ,
Benoit ROBYNS, Ecole d'Hautes Etudes d'Ingénieur, France,
Mircea M. RADULESCU, Technical University of Cluj-Napoca, Romania.

2G.10 CONNECTING A PV SUPPLIED MICRO-GRID TO THE PUBLIC (571) GRID

(p. 369) *Dumitru-Mihai VALCAN, Corneliu MARINESCU,*
Transilvania University of Brasov, Romania,
Socrates KAPLANIS,
Technological Educational Institute of Patras, Greece.

2G.13 DESIGN AND IMPLEMENTATION OF A PHOTOVOLTAIC (328) SYSTEM USING HYBRID ENERGY STORAGE

(p. 389) *Tchapo Akassewa SINGO, Andre MARTINEZ,*
School of Industrial Systems Engineering, France,
Shahrokh SAADATE, University Henry Poincarre, France.

OPTIM 2008

Friday, May 23

Session 3B-1 Motion Control, Drive Control, Modeling, Simulation

Vol. III

Room 2

11:00-13:30

Chair: Michael BRAUN, Sergey RYVKIN, Vasile COMNAC

- 3B.01 A SWITCHED RELUCTANCE MOTOR DRIVE MODEL USING STANDARD SIMULINK LIBRARY COMPONENTS**
(532)
(p. 69) *Octavian CORNEA, Dorin POPOVICI, Alin ARGESANU*
“Politehnica” University of Timisoara, Romania
- 3B.02 LOW-SPEED PERFORMANCE OF THE STATOR CURRENT-BASED MRAS ESTIMATOR WITH FL CONTROLLER IN THE SENSORLESS INDUCTION MOTOR DRIVE**
(623)
(p. 75) *Mateusz DYBKOWSKI, Teresa ORLOWSKA-KOWALSKA*
Wroclaw University of Technology, Wroclaw, Poland
- 3B.03 USING INTERNET TRAFFIC SELF-SIMILARITY FOR DETECTION OF NETWORK ANOMALIES**
(366)
(p. 81) *Radu DOBRESCU, Matei DOBRESCU, Daniela HOSSU, Sebastian. TARALUNGA, Politehnica* University of Bucharest, Romania
- 3B.04 DYNAMIC CALIBRATION OF REMOTE MULTISENSORS USING INVERSE PROBLEM SOLUTION**
(375)
(p. 87) *Dan NECSULESCU, University of Ottawa, Canada*
Rahim JASSEMI-ZARGANI, DRDC Ottawa, Canada
Jurek SASIADEK, Carleton Ottawa, Canada
- 3B.05 SENSORLESS VECTOR CONTROL OF PMSM DRIVE USING HETERODYNE TECHNIQUE**
(661)
(p. 93) *Mukeshkumar P. CHAUDHARY, J.G. JAMNANI*
Nirma University of Science and Technology, Ahmedabad, India
Vinod PATEL, Amtech Electronics (I) Ltd, Gandhinagar, India
- 3B.06 IMPLEMENTATION OF SPEED CONTROLLER FOR SWITCHED RELUCTANCE MOTOR DRIVE USING FUZZY LOGIC**
(396)
(p. 101) *Thomaq KOBLARA, Politehnica* University of Timisoara, Romania

(To be continued on the next page)

OPTIM 2008

Friday, May 23

Session 3C-1 Motion Control, Drive Control, Modelling, Simulation

Vol. III

Room 2

11:00-13:30

Chair: Michael BRAUN, Sergey RYVKIN, Vasile COMNAC

**3C.01 STATIONARITY INDEX BASED SEGMENTATION APPROACH IN
(391) LEAK LOCATING SYSTEMS**

(p. 121) *Marllene DANETII, Politehnica University of Timisoara, Romania*

**3C.02 ROBUST MACHINE VISION FRAMEWORK FOR LOCALIZATION OF
(576) UNKNOWN OBJECTS**

(p. 127) *Sorin GRIGORESCU, Axel GRÄSER, University of Bremen, Germany*

OPTIM 2008

Friday, May 23

Session 2E-1	Automotive Electrical Equipment
Session 2F-1	Electric, Hybrid and Fuel Cell Vehicles, Control Technics
Vol. II-A	Room 3 11:00-13:00

Chair: Mahesh SWAMY, Mihai CISTELECAN, Nathan IDA

- 2E.01 MODIFIED Z-SOURCE SINGLE-PHASE INVERTER FOR SINGLE-PHASE PM SYNCHRONOUS MOTOR DRIVES**
(556)
(p. 245) *Róbert ANTAL, Nicolae MUNTEAN, Ion BOLDEA,*
University “Politehnica” of Timisoara, Romania
- 2E.02 REVERSIBLE DC-TO-DC CONVERTER FOR A DUAL VOLTAGE AUTOMOTIVE SYSTEM USING ZERO VOLTAGE SWITCHING TECHNIQUE**
(568)
(p. 251) *Petre SCORTARU, Mihai CERNAT,* Transilvania University of Brasov, Romania,
Dan Valentin NICOLAE, Tshwane University of Pretoria, South Africa,
Zoltan PUKLUS, “Szechenyi Istvan” University of Gyor, Hungary
- 2E.03 ELECTROMAGNETIC, THERMAL AND MECHANICAL DESIGN OF A LINEAR PM VALVE ACTUATOR LABORATORY MODEL**
(379)
(p. 259) *Ion BOLDEA, Sorin-Cristian AGARLITA, Lucian TUTELEA,*
University “Politehnica” of Timisoara, Romania,
Fabrizio MARIGNETTI, University of Cassino, Italy
- 2F.01 SERIES HYBRID POWERTRAIN BASED ON THE DUAL TWO-LEVEL CONVERTER**
(563)
(p. 277) *Claudio ROSSI, Gabriele GRANDI, Piero CORBELLI,*
University of Bologna, Italy
- 2F.02 PLUG-IN HYBRID CONVERSION OF A SERIES HYBRID ELECTRIC VEHICLE AND SIMULATION COMPARISON**
(414)
(p. 287) *Poria FAJRI, Behzad ASAEI,* University of Tehran, Iran
- 2F.04 MODULAR TEST BENCH FOR A HYBRID ELECTRIC VEHICLE WITH MULTIPLES ENERGY SOURCES**
(594)
(p. 299) *Carmen LUNGOCI, Elena HELEREA,*
“Transilvania” University of Brasov, Romania,
David BOUQUAIN, Abdellatif MIRAOUI,
University of Technology of Belfort-Montbéliard, France

(To be continued on the next page)

OPTIM 2008

Friday, May 23

**Session 1H Advanced Optimization Methods in Electrical
and Electronics Engineering**

Vol. I

Room 3

11:00-13:00

Chair: Mahesh SWAMY, Mihai CISTELECAN, Nathan IDA

**1H.01 FEM ANALYSIS AND CONTROL OF A TAPERED AIRGAP SINGLE
(386) PHASE PMSM.**

(p. 241) *Liviu IEPURE, Lucian TUTELEA, Ion BOLDEA,*
University *Politehnica* of Timisoara, Romania.

**1H.02 25 KW, 15 KRPM, 6/4 PMSM: OPTIMAL DESIGN AND TORQUE
(383) PULSATION REDUCTION VIA FEM**

(p. 249) *Vlad GRADINARU, Lucian TUTELEA, Ion BOLDEA,*
University "Politehnica" of Timisoara, Romania

OPTIM 2008

Friday, May 23

Student Forum 2

Vol. I

Room 4

11:00-13:00

Chair: Stefan ONIGA, Mihai IORDACHE, Gheorghe Daniel ANDREESCU

SF.04 PRACTICAL PLACEMENTS FOR STUDENTS IN ELECTRICAL ISSUES
Ovidiu CLOTEA, ICCO Brasov (www.icco.ro)

SF.05 IEEE MEMBERSHIP BENEFITS TO STUDENTS
Robert D. LORENZ, Fellow, IEEE,
University of Wisconsin-Madison, USA.

SF.06 ADVANCES IN NEURAL NETWORKS FOR STUDENTS
Marley VELLASCO, Member, IEEE,
Pontifical Catholic University of Rio de Janeiro, Brazil

OPTIM 2008

Friday, May 23

Dialogue Session 2

Vol. I

Lobby First Floor

14:00-15:00

1C.05 2-D FEM SIMULATION OF AN ELECTROMAGNETIC INDUCTION FLOWMETER.

(332)
(p. 65) *Maria Angeles RODRIGUEZ NEGRO, Daniel MORINIGO,*
University of Valladolid, Spain,
Jorge FERNANDEZ-IZQUIERDO CABALLERO,
Aleaciones Ligeras Aplicadas, Mojados, Valladolid, Spain,
Rafael CUESTA BARBADO, Jose Antonio MAROTO SOTO,
Light Allois Unit, Boecillo, Valladolid, Spain.

1C.06 THE CHOICE OF REGULARIZATION PARAMETER BY FUZZY INTERFERENCE FOR MAGNETIC FIELD SYNTHESIS.

(600)
(p. 71) *Andrei CECLAN, Dan Doru MICU, Dan MICU, Levente CZUMBIL,*
Technical University of Cluj-Napoca, Romania,
Constantin BARBULESCU, University Politehnica of Timisoara, Romania.

1D.01 RADIATION EXPOSURE FACILITIES FOR MEDICAL STUDIES IN VITRO AND VIVO.

(539)
(p. 77) *Diana MARTIN, Gabriela CRACIUN, Constantin MATEI,*
Daniel IGHIGEANU, Elena MANAILA,
National Institute for Lasers, Plasma and Radiation Physics, Bucharest, Romania,
Sabin CINCA, "A. Trestioreanu" Oncology Institute, Bucharest, Romania,
Iulian TOGOE,
Agriculture and Veterinary Medicine University, Bucharest, Romania,
Irina MĂRGĂRITESCU,
Carol Davila University of Medicine and Pharmacy, Bucharest, Romania,
Monica NEAGU, "Victor Babes" National Institute, Bucharest, Romania.

1D.02 A MEDICAL APPLICATION OF ELECTROMAGNETIC FIELDS: THE MAGNETIC STIMULATION OF NERVE FIBERS INSIDE A CYLINDRICAL TISSUE.

(583)
(p. 87) *Mihaela PLESA, Laura DARABANT, Radu CIUPA,*
Technical University of Cluj-Napoca, Romania,
Adrian DARABANT, „Babes-Bolyai” University, Cluj-Napoca, Romania.

(To be continued on the next page)

OPTIM 2008

Friday, May 23

Dialogue Session 2

Vol. I

Lobby First Floor

14:00-15:00

- 1D.03 SOLUTIONS PROPOSED FOR THE OPTIMIZATION OF INSTALLATIONS FOR ELECTRICAL DEDUSTING.**
(444)
(p. 93) *Viorel OSIAC, Aurel CAMPEANU, Ion VLAD, Sorin ENACHE,*
University of Craiova, Romania.
- 1D.04 RESPIRATORY PRESSURE LEVEL REGULATION BASED ON A FRACTIONAL-ORDER MODEL FOR SUBJECTS WITH CHRONIC OBSTRUCTIVE PULMONARY DISEASE.**
(519)
(p. 99) *Clara-Mihaela IONESCU, Robin DE KEYSER,* Ghent University, Belgium,
Bogdan NOUR, Viorel DUGAN, "Dunarea de Jos" University of Galati, Romania.
- 1E.04 RADIATION PROCESSING OF RUBBER MIXTURES WITH POLYFUNCTIONAL MONOMERS**
(538)
(p. 125) *Elena MANAILA, Diana MARTIN, Gabriela CRACIUN, Daniel IGHIGEANU,*
Constantin MATEI,
National Institute for Lasers, Plasma and Radiation Physics, Bucharest, Romania,
Daniela ZUGA,
National R&D Institute for Textile and Leather, Bucharest, Romania
- 1F.07 AN OPTIMAL LOAD-SHEDDING SCHEME DURING CONTINGENCY SITUATIONS USING META-HEURISTICS ALGORITHMS WITH APPLICATION OF AHP METHOD.**
(440)
(p. 167) *Behzad FARHANGI RAD, Mehrdad ABEDI,*
Amirkabir University of Technology, Tehran, Iran.
- 1F.08 OPTIMAL LOAD-SHEDDING SCHEME DURING CONTINGENCY SITUATIONS USING GENETIC, PSO ALGORITHMS.**
(514)
(p. 173) *Behzad FARHANGI RAD, Mehrdad ABEDI,*
Amirkabir University of Technology, Tehran, Iran.
- 1F.09 A NEW STOCHASTIC METHOD BASED ON HIDDEN MARKOV MODELS TO TRANSFORMER DIFFERENTIAL PROTECTION.**
(553)
(p. 179) *Saeed JAZEBI, Behrooz VAHIDI, Seyyed Hossein HOSSEINIAN,*
Amirkabir University of Technology, Tehran, Iran.

(To be continued on the next page)

OPTIM 2008

Friday, May 23

Dialogue Session 2

Vol. I

Lobby First Floor

14:00-15:00

- 1F.10 PERFORMANCE COMPARISON OF GA AND DEA IN SOLVING DISTRIBUTION SYSTEM RECONFIGURATION PROBLEM.**
(321)
(p. 185) *Saeed JAZEBI, Seyed Hossein HOSSEINIAN, Behrooz VAHIDI,*
Amirkabir University of Technology, Tehran, Iran,
Mojtaba POOYAN, Shahid Bahonar University, Kerman, Iran.
- 1F.11 CURRENTS CLOSING VIA THE COPPER RIBBON OF MV CABLES AT SINGLE-PHASE SHORT-CIRCUITS ON THE HV SIDE OF A 110/20 KV STATION.**
(606)
(p. 191) *Dumitru TOADER, Stefan HARAGUS, Constantin BLAJ,*
University Politehnica of Timisoara, Romania.
- 1F.12 OPTIMAL OVERCURRENT RELAYS COORDINATION USING GENETIC ALGORITHMS.**
(621)
(p. 197) *Mohammad Reza ASADI, Mahdi MAHMOODAN,*
Amangaldi KOOCHAKI, Amirkabir University of Technology, Tehran, Iran.
- 1F.13 IMPROVED PARAMETRIC PSPICE MODEL OF A PEM FUEL CELL.**
(601)
(p. 203) *Goce ARSOV,*
SS "Cyril and Methodius", University of Skopje, Republic of Macedonia.
- 1F.14 IMPROVEMENT OF VOLTAGE STABILITY AND REDUCE POWER SYSTEM LOSSES BY OPTIMAL GA-BASED ALLOCATION OF MULTI-TYPE FACTS DEVICES.**
(371)
(p. 209) *Hamid Reza BAGHAEI, Behrooz VAHIDI, Mohsen JANNATI,*
Seyed Hossein HOSSEINIAN, Hassan RASTEGAR,
Amirkabir University of Technology, Tehran, Iran.
- 1F.15 A NOVEL APPROACH FOR OPTIMIZING DEAD TIME OF EXTRA HIGH VOLTAGE TRANSMISSION LINES.**
(372)
(p. 215) *Mohsen JANNATI, Behrooz VAHIDI, Seyed Hossein HOSSEINIAN,*
Hamid Reza BAGHAEI, Amirkabir University of Technology, Tehran, Iran.
- 1G.03 INTEGRATION DESIGN OF FUZZY SYSTEM USING GENETIC ALGORITHM FOR IMPROVEMENT OF VOLTAGE PROFILE WITH STATIV VAR COMPENSATOR.**
(544)
(p. 235) *Ehsan SAEIDPOUR, Mehrdad ABEDI, Vahid Saeidpour Parizy,*
Amirkabir University of Technology, Tehran, Iran.

OPTIM 2008

Friday, May 23

Dialogue Session 2

Vol. I

Lobby First Floor

14:00-15:00

1H.03 BIDIRECTIONAL COUPLING OF ELECTROMAGNETIC AND THERMAL PROCESSES IN RADIOFREQUENCY HYPERTHERMIA GENERATOR.
(428)
(p. 257)

Mihaela MOREGA, Alexandru MOREGA,
Politehnica University of Bucharest, Romania,
Marius NEAGU, National Institute of Metrology, Bucharest, Romania.

1H.04 DERATING OF TRANSFORMERS UNDER NON-SINUSOIDAL LOADS
(423)
(p. 263)

Seyed Mohammad Bagher SADATI, Abdolhosein TAHANI, Mehdi DARGAHI,
“Noshirvani” Technical University of Babol, Iran

1H.05 APPLICATION OF ANT COLONY SYSTEM ALGORITHM TO DISTRIBUTION NETWORKS RECONFIGURATION FOR LOSS REDUCTION
(407)
(p. 269)

Morteza Abbasghorbani GHORBANI, Seyyed Hossein HOSSEINIAN,
Behrooz VAHIDI, Amirkabir University of Technology, Tehran, Iran

1A.04 PERMAGNET MAGNETS THERMAL OPERATION LIMITS IN A HYBRID EXCITED SYNCHRONOUS MACHINE USED ON WIDE SPEED APPLICATIONS.
(438)
(p. 21)

Daniel FODOREAN, Abdellatif MIRAOUI,
Belfort-Montbéliard University of Technology, France.

OPTIM 2008

Friday, May 23

Dialogue Session 2

Vol. II

Lobby First Floor

14:00-15:00

- 2A.02 ON THE DAMPER-BAR CURRENT CALCULATION FOR HIGH POWER SALIENT POLES SYNCHRONOUS MACHINES**
(405)
(p. 9) *Atilla BANYAI, Basile KAWKABANI, Jean-Jacques SIMOND,*
Swiss Federal Institute of Technology, Lausanne, Switzerland,
Alina Cristina VIOREL, Liliana VICOL,
Technical University of Cluj-Napoca, Romania
- 2A.10 DETERMINATION OF ASYNCHRONOUS MACHINE PARAMETERS BY A DYNAMIC TEST**
(342)
(p. 57) *Sorin ENACHE, Aurel CAMPEANU, Ion VLAD, Monica-Adela ENACHE,*
University of Craiova, Romania
- 2A.11 THE MAGNETIC NOISE OF THREE-PHASE INDUCTION MOTORS WITH SQUIRREL CAGE ROTORS**
(540)
(p. 63) *Ioan PETER, S.C. "Electroprecizia", Sacele, Romania,*
Gheorghie SCUTARU, Transilvania University of Brasov, Romania
- 2A.12 STATOR WINDING LEAKAGE INDUCTANCES DETERMINATION USING FINITE ELEMENTS METHOD**
(527)
(p. 69) *Olivian CHIVER, Cristian BARZ, North University of Baia Mare, Romania,*
Emil MICU, Transilvania University of Brasov, Romania
- 2A.13 ANALYSIS OF PERMANENT MAGNET CLAW-POLE SYNCHRONOUS MACHINE**
(411)
(p. 75) *Florin-Nicolae JURCA, Claudia MARTIS, Iulian BIROU, Karoly BIRO,*
Technical University of Cluj-Napoca, Romania
- 2A.14 OPTIMAL DESIGN OF PERMANENT MAGNET SYNCHRONOUS MACHINES OR HYBRID ELECTRIC VEHICLES**
(323)
(p. 81) *Siavash SADEGHI, Islamic Azad University of Natanz, Isfahan, Iran,*
Arash Hassanpour ISFAHANI, Behzad ASAEI, University of Tehran, Iran,
Mojtaba MIRSALEM, Amirkabir University of Technology, Tehran, Iran

(To be continued on the next page)

OPTIM 2008

Friday, May 23

Dialogue Session 2

Vol. II

Lobby First Floor

14:00-15:00

- 2A.15 ENHANCED CURRENT-SENSORLESS DRIVE SYSTEM FOR PMSMS USING TWO HALL-EFFECT SENSORS FOR WIDE SPEED RANGE**
(420)
(p. 87) *Nicolae Valeriu OLARESCU*, Diehl AKO Stiftung & Co. KG, Wangen, Germany
Sorin MUSUROI, *Ciprian SORANDARU*, *Gheorghe ATANASIU*,
University *Politehnica* of Timisoara, Romania
- 2A.16 POSITION SENSORLESS DIRECT TORQUE CONTROL OF BLDC MOTOR BY USING MODIFIER**
(615)
(p. 93) *G. Reza ARAB MARKADEH*, Shahrekord University, Iran,
S. I. MOUSAVI, *Ehsan DARYABEIGI*, Azad University, Isfahan, Iran
- 2A.17 ON THE DESIGNING PROCEDURE OF A PERMANENT| MAGNET TRANSVERSE FLUX GENERATOR (PMTFG) WITH SPECIFIC TOPOLOGY**
(397)
(p. 99) *Larisa STRETE*, *Ioan-Adrian VIOREL*, Technical University of Cluj-Napoca, Romania,
Alina VIOREL, Lucian Blaga University of Sibiu, Romania
- 2A.18 NUMERICAL OPTIMAL VECTOR CONTROL FOR TORQUE CONTROL OF INTERIOR PERMANENT MAGNET SYNCHRONOUS MOTOR BY POINCARÉ MAP AND AVERAGING THEORY**
(376)
(p. 105) *Roozbeh MOLAVI*, *Davood KHABURI*,
University of Science and Technology, Tehran, Iran,
Seyed Mohammad SHARIATMADAR,
Centre of Excellence for Power System Operation and Automation, Tehran, Iran
- 2A.19 PRE-DETERMINATION BY SIMULATION OF DYNAMIC REGIME FOR DIRECT CURRENT**
(343)
(p. 111) *Ion VLAD*, *Aurel CAMPEANU*, *Sorin ENACHE*, *Monica-Adela ENACHE*,
University of Craiova, Romania
- 2B.03 TRANSVERSE FLUX TUBULAR SWITCHED RELUCTANCE MOTOR**
(575)
(p. 131) *Ioan-Adrian VIOREL*, *Larisa STRETE*,
Technical University of Cluj-Napoca, Romania,
Kay HAMEYER, Institute of Electrical Machines, Aachen, Germany

OPTIM 2008

Friday, May 23

Dialogue Session 2

Vol. II

Lobby First Floor

14:00-15:00

- 2B.04 IMPROVED DESIGN OF A LINEAR TRANSVERSE FLUX RELUCTANCE MOTOR**
(399)
(p. 137) *Dan-Cristian POPA, Vasile IANCU, Lorand SZABO,*
Technical University of Cluj-Napoca, Romania
- 2C.08 ENHANCING THE CONTROL RANGE OF A MATRIX CONVERTER WITH COMMON MODE FREE OUTPUT VOLTAGE**
(418)
(p. 189) *Alexander STAHL, Michael BRAUN,*
University of Karlsruhe, Germany
- 2C.09 STUDY ON A SIMPLIFIED CONVERTER TOPOLOGY FOR FAULT TOLERANT MOTOR DRIVES**
(614)
(p. 197) *Lorand SZABO, Mircea RUBA, Daniel FODOREAN,*
Technical University of Cluj-Napoca, Romania
- 2C.10 SIMULINK MODEL OF FLYING CAPACITOR MULTILEVEL INVERTER**
(603)
(p. 203) *Adrian SCHIOP,* University of Oradea, Romania,
Petre SCORTARU, Transilvania University of Brasov, Romania
- 2D.05 AN OPTIMAL SELECTION OF INDUCTION HEATER CAPACITANCE BY GENETIC ALGORITHM CONSIDERING DISSIPATION LOSS CAUSED BY ESR**
(501)
(p. 239) *Ehsan DARYABEIGI, Fahimeh Tahvili POUR FARD,*
Islamic Azad University, Isfahan, Iran,
Gholamreza ARAB, Shahrekord University, Iran
- 2E.04 3D FINITE ELEMENT ANALYSIS OF A PERMANENT MAGNET ELECTROMAGNETIC VALVE ACTUATOR**
(595)
(p. 265) *Ivan YATCHEV, Krastyo HINOV, Vultchan GUEORGIEV,*
Technical University of Sofia, Bulgaria,
Dimitar DIMITROV, Technical University of Varna, Bulgaria

OPTIM 2008

Friday, May 23

Dialogue Session 2

Vol. II

Lobby First Floor

14:00-15:00

- 2E.05 A NEW 42 V AUTOMOTIVE SUPPLY SYSTEM BASED ON
(531) CONVENTIONAL 14 V ALTERNATOR**
(p. 271) *Vasile COMNAC, Mihai CERNAT, Cristian BOLDISOR,*
“Transilvania” University of Brasov, Romania,
Jan VITTEK, University of Zilina, Slovakia,
Raul RABINOVICI, Ben Gurion University of the Negev, Israel
- 2E.06 DYNAMIC RESPONSE EVALUATION FOR ELECTRIC SHIP DRIVE
(431) PROPULSION**
Vasile DOBREF, Paul BURLACU
Naval Academy “Mircea cel Batran”, Constanta, Romania
- 2F.03 PROPERTIES OF HYBRID ELECTRIC DRIVE WITH ELECTRIC
(510) POWER SPLITTER**
(p. 293) *Zdenek CEROVSKY, Pavel MINDL,*
Czech Technical University Prague, Czech Republic
- 2F.05 CONTRIBUTIONS REGARDING THE DEVELOPMENT OF A LIGHT
(629) URBAN TRANSPORTATION VEHICLE – MOTOR AND PWM
(p. 307) INVERTER DESIGN**
Viorel TRIFA, Calin MARGINEAN, Emil TRIFU,
Technical University of Cluj-Napoca, Romania

OPTIM 2008

Friday, May 23

Session 2D-1 **Power Electronics for Power Systems and Power Quality**
Vol. II Room 1 15:00-17:30

Chair: Rainer LAUR, Razvan MAGUREANU, Lucian TUTELEA

- 2D.01 DESIGN OF CROSS-COUPPLING FREE CURRENT MODE
(616) CONTROLLER FOR UPFC SERIES CONVERTER**
(p. 209) *Ivo M. MARTINS*, University of Algarve, Portugal,
J. Dionisio BARROS, University of Madeira, Portugal,
Fernando A. SILVA, Technical University of Lisbon, Portugal
- 2D.02 COMPARATIVE EVALUATION OF PASSIVE HARMONIC
(345) MITIGATING TECHNIQUES FOR SIX PULSE RECTIFIERS**
(p. 219) *Dennis KAMPEN*, *Udo L. THIEL*,
BLOCK Transformatoren & Elektronik GmbH, Verden, Germany,
Nejila PARSPOUR, ILEA, University of Stuttgart, Germany,
Uwe PROBST, University of Applied Sciences Giessen-Friedberg, German
- 2D.03 INVESTIGATIONS CONCERNING THE APPLICATION
(417) POSSIBILITIES OF THE COMPLEX POWER FACTOR CORRECTION**
(p. 227) *Mircea BOJAN*, *Richard MARSCHALKO*,
Technical University of Cluj-Napoca, Romania,
Balogh PÁL, General Electric Healthcare, Budaors, Hungary,
Denes FODOR, University of Pannonia-Veszprém, Hungar
- 2D.04 DC-DC CONVERTER WITH CLOSED LOOP CONTROL THROUGH
(574) SEVERAL OPTIMIZING METHODS**
(p. 233) *Mehdi MAHDAVIAN*, *Mohammad BAYATI POUDEH*,
Saeid ESHTEHARDIHA, Islamic Azad University-Naein Branch, Iran

(To be continued on the next page)

OPTIM 2008

Friday, May 23

Session 1B-1

Electric Circuits and Networks

Vol. II

Room 1

15:00-17:30

Chair: Rainer LAUR, Razvan MAGUREANU, Lucian TUTELEA

1B.01 NETWORK FUNCTION GENERATION FOR MIMO SYSTEMS

(561) *Mihai IORDACHE, Lucia DUMITRIU,*
(p. 27) “Politehnica” University of Bucharest, Romania

1B.02 MODEL BASED DESIGN OPTIMISATION OF MICRO MECHANICAL SYSTEMS, BASED ON THE COSSERAT THEORY

(662) *Till WIEGAND, Dagmar PETERS-DROLSHAGEN, Rainer LAUR,*
(p. 33) University of Bremen, Germany,
Richard ROSING, Andrew RICHARDSON, University of Lancaster, UK,
Marco DEL SARTO, Lorenzo BALDO, STMicroelectronics, Milano, Italy

OPTIM 2008

Friday, May 23

Session 3D-1 Adaptive and Robust Control

Session 3F-1 Industrial Informatics

Session 3G-1 Communication Systems

Vol. III

Room 2 15:00-17:00

Chair: Dorin ISAR, Ioan SILEA, Rozalina DIMOVA

3D.02 ADAPTIVE COMMAND FOR CIRCULAR SAW

(522) *Gavril URDEA, Ioan SILEA, Adrian BUT*

(p. 137) "Politehnica" University of Timisoara, Romania

3F.01 MONITORING OF ENERGY CONSUMPTION IN INDUSTRIAL ENVIRONMENT USING INTEGRATED SOFTWARE SYSTEM

(666) *Sorin-Aurel MORARU, Cătălin BUJDEI, Adrian PELCZ, Marius Cristian VULPE, Francisc SISAK, Liviu PERNIU*

"Transilvania" University of Brasov, Romania

3F.02 AN AGENT-BASED APPROACH TO POWER SYSTEM CONTROL

(525) *Cristinel COSTEA, Mircea HORGOS*

(p. 179) North University of Baia Mare, Romania

3F.03 DYNAMIC SIMULATION MODEL FOR IMAGE BASED VISUAL SERVO CONTROL SYSTEMS

(394) *Corneliu LAZAR, Adrian BURLACU*

Gh. Asachi Tehnical University of Iasi, Romania

3G.01 A MOBILITY-AWARE CROSS LAYER CONGESTION CONTROL, ROUTING AND SCHEDULING DESIGN IN AD-HOC WIRELESS NETWORKS

(424) *Mohsen SHAFIEI RAD, Masound SHAFIEE*

Amirkabir University of Tehnology, Iran

(To be continued on the next page)

OPTIM 2008

Friday, May 23

Session 3D-1 Adaptive and Robust Control

Session 3F-1 Industrial Informatics

Session 3G-1 Communication Systems

Vol. III

Room 2 15:00-17:00

Chair: Dorin ISAR, Ioan SILEA, Rozalina DIMOVA

**3G.02 EFFICIENT DATA PROPAGATION TECHNIQUES AND SECURITY
(541) CONCERNS IN LOW RATE WIRELESS PERSONAL AREA NETWORKS
(p. 201) IN OUTDOOR AND INDOOR SCENARIOS**

*Mihai MACHEDON-PISU, Iuliu SZEKELY, Radu GAVRUS
Transilvania University of Brasov, Romania*

**3G.03 AN INTERPRETATION OF CONVERGENCE THEORY FOR
(564) COMMUNICATION SYSTEMS**

**(p. 207) Marius-Cristian VULPE, Anca-Diana VULPE, Francisc SISAK,
Sorin-Aurel MORARU**

Transilvania University of Brasov, Romania

**3G.04 IMPROVING MULTICAST GROUP MANAGEMENT IN IEEE 802.11
(605) WIRELESS NETWORKS**

(p. 211) Sorin COCORADA

Transilvania University of Brasov, Romania

**3G.05 OPTIMIZATION OF GSM-UMTS CORE NETWORK FOR IP
(640) CONVERGENCE IN 4G THROUGH MOBILE IPV6**

(p. 217) Iuliu SZEKELY, Titus BALAN, Dan ROBU, Szilard CSEREY

Transilvania University of Brasov, Romania

**3G.06 SIMULATION OF AN ADVANCED MOBILE COMMUNICATION
(641) NETWORK**

(p. 223) Florin SANDU, Szilard CSEREY, Iuliu. SZEKELY, Dan ROBU, Titus BALAN

Transilvania University of Brasov, Romania

OPTIM 2008

Friday, May 23

Session 1C-1 Electromagnetic Field, Electrostatic Processes, EMC, EMI

Vol. I

Room 3

15:00-17:30

Chair: Nathan IDA, Ivan YATCHEV, Dumitru TOADER

- 1C.01 MHD SIMULATION OF A VORTEX PRODUCED BY A LIM IN A SMALL CYLINDRICAL VESSEL FILLED WITH MOLTEN ALUMINUM.**
(336)
(p. 39) *Daniel MORINIGO, Maria Angeles RODRIGUEZ NEGRO,*
University of Valladolid, Spain,
Angel DELGADO, Energy and Environment Unit, Boecillo, Valladolid,
Spain,
Ana RIVAS, Jorge MARTIN, Light Alloys Unit, Boecillo, Valladolid, Spain.
- 1C.02 FEM ANALYSIS OF CONCENTRATED COILS NONUNIFORM SLOT (6+6/8) IPMSM FED WITH TRAPEZOIDAL CURRENT.**
(389)
(p. 45) *Alin STIRBAN, Lucian TUTELEA, Ion BOLDEA,*
University "Politehnica" of Timisoara, Romania,
Dorin ILES-KLUMPNER,
EBM-PAPST St. Georgen GmbH & Co. KG, St.Georgen, Germany.
- 1C.03 ASSESSMENT AND CERTIFICATION OF THE SHIELDING SYSTEMS.**
(382)
(p. 53) *Andrei MARINESCU,* Research and Testing Institute ICMET, Craiova, Romania.
- 1C.04 MEASUREMENT TECHNIQUES FOR DETERMINATION OF SHIELDING EFFECTIVENESS CHARACTERIZING SHIELDED COAXIAL CABLES.**
(447)
(p. 59) *Mihaela LASCU,* University "Politehnica" of Timisoara, Romania.

OPTIM 2008

Friday, May 23

Session 1E-1 Electromagnetic Processing of Materials

Vol. I

Room 3

15:00-17:30

Chair: Nathan IDA, Ivan YATCHEV, Dumitru TOADER

**1E.01 MAGNETIC FIELD CONTROL OF FLOW AND HEAT TRANSFER IN
(435) SOLIDIFICATION PROCESSES.**

(p. 105) *Hideo KAWAHARA,*

Oshima National College of Maritime Technology, Yamaguchi, Japan,
Alexandru M. MOREGA, Mihaela MOREGA,
Politehnica University of Bucharest, Romania

**1E.02 OPTIMISATION OF AN ELECTROCORPORATION DEVICE FOR
(355) MASH.**

(p. 113) *Martin SACK, Georg MÜLLER,* Forschungszentrum Karlsruhe GmbH, Germany.

**1E.03 OBTAINING THE HIGH PERFORMANCE PTC THERMISTORS
(657) BASED ON BARIUM TITANATE.**

(p. 119) *Irina APOSTOL, SC IPEE ATI SA,* Curtea de Arges, Romania,
Elena HELEREA, Danut I. OLTEAN, Adrian MATOI,
Transilvania University of Brasov, Romania.

OPTIM 2008

Friday, May 23

Session 1A-1 Advances in Magnetic Materials (Round Table)

Vol. I, pp. 3-26

Room 4

15:00-17:30

Chair: Alexandru NICOLAE, Elena HELEREA, Jacques CURELY

1A.01 THEORY OF SUPEREXCHANGE FOR $3d^n$ -IONS ($1 \leq n \leq 9$) INVOLVED (664) IN NATURAL AND ARTIFICIAL MAGNETS.

(p. 3) I - SETTING THE PROBLEM.

Jacques CURÉLY, University of Bordeaux 1, France,
Arezki MOKRANI, University of Nantes, France.

1A.02 THEORY OF SUPEREXCHANGE FOR $3d^n$ -IONS ($1 \leq n \leq 9$) INVOLVED (665) IN NATURAL AND ARTIFICIAL MAGNETS

(p. 9) II – DERIVATION OF THE VARIOUS EXCHANGE ENERGIES J_i VS KEY MOLECULAR INTEGRALS.

Jacques CURÉLY, University of Bordeaux 1, France,
Arezki MOKRANI, University of Nantes, France.

1A.03 THE INFLUENCE OF THE DIAMAGNETIC PLATE THICKNESS ON (517) THE STABILITY ZONE IN VERTICAL STATIC MAGNETIC (p. 15) LEVITATION.

Emil CAZACU, *Alexandru NICOLAE*,
Politehnica University of Bucharest, Romania.

OPTIM 2008

Author Index

Mehrdad	ABEDI, 40, 41	Elif-Uray	AYDIN, 13
Adib	ABRISHAMIFAR, 27	Marius	BABESCU, 25
Lia-Elena	ACIU, 21	Miklós-Attila	BACZÓ, 12
Sorin-Cristian	AGARLITA, 36	Cecilia	BADITA, 31
John Terhile	AGEE, 9	Hamid Reza	BAGHAEI, 71
Mihaela	ALBU, 11	Lianjun	BAI, 27
Marian	ALEXANDRU, 22	László	BAKÓ, 12
Nimet-Ceren	ALPARSLAN, 13	Titus	BALAN, 50
Yusuf	ALTUN, 13	Lorenzo	BALDO, 48
Esmail	AMINI, 20	Atilla	BANYAI, 43
Ioannis	ANAGNOSTOPOULOS, 13	Constantin	BARBULESCU, 39
Răzvan	ANCUȚI, 27	Luminita	BAROTE, 15
Răzvan	ANDONIE, 28	Dionísio	BARROS, 47
Gheorghe- Daniel	ANDREESCU, 23, 27, 38	Cristian	BARZ, 43
Róbert	ANTAL, 36	Mohammad	BAYATI POUDEH, 19, 47
Irina	APOSTOL, 52	Rodrigo	BENAVIDES, 23
Reza	ARAB MARKADEH, 44	Robert J.	BEYNON, 12
Gholamreza	ARAB, 45	Omar	BHUIYA, 29
Alin	ARGESEANU, 8, 24, 34	Károly	BIRO, 43
Radu	ARSINTE, 22	Iulian	BIROU, 43
Goce	ARSOV, 41	Frede	BLAABJERG, 7, 10, 11, 23, 26, 32
Mohammad Reza	ASADI, 41	Tudor	BLAGA, 22
Behzad	ASAEI, 36, 43, 46	Constantin	BLAJ, 41
Gheorghe	ATANASIU, 44	Mircea	BODEA, 12, 20
Cansu-Çiğdem	AYDIN, 13	Istvan	BOGDAN, 12
		Mircea	BOJAN, 47
		Radu	BOJOI, 10, 23

OPTIM 2008

Author Index

Ion	BOLDEA, 7, 8, 9, 23, 24, 27, 32, 36, 37, 51	Mukeshkumar	CHAUDHARY, 34
Cristian	BOLDISOR, 18, 46	Virgil	CHINDRIS, 12
Adriano	BOLLERO, 33	Mircea	CHINDRIS, 21, 26
Marco	BOLLERO, 33	Calin Horia	CHIOREANU, 25
Iosif	BORCSA, 31	Traian	CHIULAN, 25
Paul	BORZA, 22	Olivian	CHIVER, 43
Valeriu	BOSTAN, 11	Sabin	CINCA, 39
David	BOUQUAIN, 36	Mihai	CIOBOTARU, 7
Sándor- Tihamér	BRASSAI, 12	Marcian	CIRSTEA, 10, 11, 15, 33
Michael	BRAUN, 14, 34, 35, 45	Mihai	CISTELECAN, 23, 24, 36, 37
Stefan	BREBAN, 33	Radu	CIUPA, 39
Peter	BRIS, 18	Luminita	CLOTEA, 10
Neil	BROWN, 11	Ovidiu	CLOTEA, 38
Attila	BUCHMAN, 20, 21	Daniel	COCA, 12, 27
Marian	BUCOS, 22	Sorin	COCORADA, 50
Cătălin	BUJDEI, 49	Simona	COMAN, 19
Bogdan	BURDUHOS, 17	Vasile	COMNAC, 18, 34, 35, 46
Gabriel		Michael	CONLON, 33
Adrian	BURLACU, 46, 49	Romul	COPÂNDEAN, 29
Adrian	BUT, 49	Piero	CORBELLI, 36, 46
Nergiz-Erçil	ÇAĞILTAY, 13	Octavian	CORNEA, 24, 34
Aurel	CAMPEANU, 40, 43, 44	Cristinel	COSTEA, 49
Radu	CAMPEANU, 8	Vincent	COURTECUISSÉ, 33
Emil	CAZACU, 15	Andrei	COZMA, 28
Andrei	CECLAN, 39	Gabriela	CRACIUN, 39, 40
Mihai	CERNAT, 18, 25, 36, 46	Szilard	CSEREY, 50
Zdenek	CEROVSKY, 46	Rafael	CUESTA BARBADO, 39

OPTIM 2008

Author Index

Jacques	CURÉLYI, 53	Matei	DOBRESCU, 34
Andrei	CZIKER, 21, 26	Radu	DOBRESCU, 34
Levente	CZUMBIL, 20, 39	Virgil	DOBROTA, 22
Catalin	DAMIAN, 29	Codrin	DONCIU, 13
Ștefan	DAN, 12	Toma	DORDEA, 8
Claudius	DAN, 20	Cristian	DOSOFTEI, 13
Andrei	DANCHIV, 20	Viorel	DUGAN, 40
Marlene	DANETI, 35	Ana Maria	DUMITRESCU, 11
Adrian	DANILA, 8	Lucia	DUMITRIU, 48
Adrian	DARABANT, 39	Anca	DUTA, 16, 17
Laura	DARABANT, 39	Mateusz	DYBKOWSKI, 34
Mehdi	DARGAHI, 42	Mazdak	EBADI, 19
Ehsan	DARYABEIGI, 44, 45	Sorin	ENACHE, 40, 43, 44
Ermis-Adonis	DAVISKAS, 15	Monica-Adela	ENACHE, 43, 44
Robin	DE KEYSER, 40	Laurentiu	ENCICA, 23
Gholam	DEHKORDI, 16	Ionut	ENCULESCU, 29
Hossein Riahy		Iasmina	ERMALAI, 22
Ali	DEIHIMI, 9, 38	Saeid	ESHTEHARDIHA, 47
Marco	DEL SARTO, 48	Mohammad	ESMAEILDOUST, 21
Angel	DELGADO, 51	Poria	FAJRI, 36, 46
Antonio	DELL'AQUILA, 16	Behzad	FARHANGI RAD, 40
Metin	DEMIRTAS, 13	Michael	FARRELL, 33
Dorin Valentin	DIACONESCU, 16, 17	Mahmood	FAZLALI, 21
Dimitar	DIMITROV, 45	Mirela-Melania	FILIP, 19
Rozalina	DIMOVA, 22, 49, 50	Virgiliu	FIRETEANU, 30
Gabriela	DIMU, 11	Adriana	FLORESCU, 24
Remus	DOBRA, 25	Dan	FLOROIAN, 18
Vasile	DOBREF, 46		

OPTIM 2008

Author Index

Dénes	FODOR, 47	Nathan	IDA, 12, 29, 36, 37, 51, 52
Daniel	FODOREAN, 42, 45	Liviu	IEPURE, 37
Cristian	FOSALAU, 29	Daniel	IGHIGEANU, 39, 40
Alexandru-Florin	GABOR, 22	Dorin	ILES-KLUMPNER, 27, 51
Honorius	GALMEANU, 28	Leo	ILKKO, 29, 30
Ciprian	GAVRINCEA, 21	Maria	IMECS, 8
Radu	GAVRUS, 50	Ioan Iov	INCZE, 8
Morteza Abbasghorban i	GHORBANI, 42	Razvan	IOACHIM, 31
Vlad	GRADINARU, 37	Catalin Petrea	ION, 10
Gabriele	GRANDI, 36, 46	Dan	IONEL, 8, 9
Axel	GRASER, 35	Clara-Mihaela	IONESCU, 40
Adrian	GRAUR, 19	Mihai	IORDACHE, 38, 48
Octavian	GRIGORE-MULER, 28	Florin	IOV, 7
Sorin	GRIGORESCU, 35	Doru	ISAR, 49, 50
Giovanni	GRIVA, 23	Arash Hassanpour	ISFAHANI, 43
Vultchan	GUEORGIEV, 45	Ayhan	ISTANBULLU, 13
Kay	HAMEYER, 44	Cosmin	IVAN, 18
Stefan	HARAGUS, 41	Mihai	IVANOVICI, 21
Elena	HELEREA, 25, 26, 36, 52, 53	Grzegorz	IWANSKI, 11
Krastyo	HINOV, 45	Codruta	JALIU, 16
Mircea	HORGOS, 49	J.G.	JAMNANI, 34
Seyyed Hossein	HOSSEINIAN, 40, 41, 42	Peter	JANECKO, 32
Daniela	HOSSU, 34	Mohsen	JANNATI, 41
Cristina	HURJUI, 19	Ashkan	JASOUR, 27
Vasile	IANCU, 45	Mohammad Zadeh	
		Rahim	JASSEMI-ZARGANI, 34

OPTIM 2008

Author Index

Saeed	JAZEBI, 40, 41	Dominic	KRISTALY, 13
Zahra	JEDDI, 20	Tsuneo	KUME, 7
Adisa Abdul- Ganiy	JIMOH, 9	Hakan	KUNTMAN, 12
Mahmood	JOORABIAN, 19	Mihaela	LASCU, 51
Matthias	JOOST, 18	Rainer	LAUR, 18, 47, 48
Florin-Nicolae	JURCA, 43	Corneliu	LAZAR, 27, 28, 49
Firat	KAÇAR, 12	Leonardo	LIMONGI, 10, 33
Bartłomiej	KAMINSKI, 11	Marco	LISERRE, 16, 26
Dennis	KAMPEN, 47	Elena	LOMONOVA, 23
Eleni	KAPLANI, 15	Robert D.	LORENZ, 32, 38
Socrates	KAPLANIS, 15, 33	Doru	LUCULESCU, 19
Ali	KARA, 13	Álvaro	LUNA, 26
Ali Kashafi	KAVIANI, 16	C.	LUNG, 18
Hideo	KAWAHARA, 52	Carmen	LUNGOCI, 36
Basile	KAWKABANI, 43	Mihai	MACHEDON-PISU, 50
Eleftherios	KAYAFAS, 13	Gheorghe	MADESCU, 8
Tamas	KEREKES, 16	Razvan	MAGUREANU, 11, 47, 48
Csaba-Zoltán	KERTÉSZ, 22, 29	Mehdi	MAHDAVIAN, 19, 47
Davood	KHABURI, 44	Mahdi	MAHMOODAN, 41
Seyed Mostafa	KHAZRAEI, 27	Pavol	MAKYS, 18
Andrew	KINGSTON, 31, 32	Elena	MANAILA, 39, 40
Thomaq	KOBLARA, 34	Simona	MANOLACHE, 17
Włodzimierz	KOCZARA, 11, 15	Frank	MARCH, 14, 30
Vassilis	KOLIAS, 13	Irina	MĂRGĂRITESCU, 39
Amangaldi	KOOCHAKI, 41	Calin	MARGINEAN, 39, 46
Shahram	KOUHSARI, 16	Ioan	MĂRGINEANU, 8
Montaser		Fabrizio	MARIGNETTI, 36

OPTIM 2008

Author Index

Corneliu	MARINESCU, 10, 11, 15, 33	Mahmood	MOGHADDASIAN, 19
Daniela	MARINESCU, 15	Mohamed	MOHANDES, 29
Andrei	MARINESCU, 51	Arezki	MOKRANI, 53
Jose Antonio	MAROTO SOTO, 39	Roozbeh	MOLAVI, 44
Richard	MARSCHALCO, 47	Cristian	MOLDER, 28
Diana	MARTIN, 39, 40	Florin	MOLDOVEANU, 18
Jorge	MARTIN, 51	Petru	MOLNAR, 21
Mugur	MARTINESCU, 19	Trevor	MONK, 10
Andre	MARTINEZ, 33	Gheorghe	MORARIU, 22
Ivo	MARTINS, 47	Sorin-Aurel	MORARU, 49, 50
Claudia	MARTIS, 43	Mihaela	MOREGA, 29, 30, 42, 52
Morteza	MASHAYEKHI, 20	Alexandru M.	MOREGA, 31, 42, 52
Rosa	MASTROMAURO, 16	Daniel	MORINIGO, 39, 51
Constantin	MATEI, 39, 40	Marțian	MOȚ, 8
Adrian	MATOI, 52	Seied Iman	MOUSAVI, 44
Daniel	MIC, 18	Georg	MÜLLER, 52
Emil	MICU, 18, 43	Asim	MUMTAZ, 33
Dan	MICU, 39	Nicolae	MUNTEAN, 36
Dan Doru	MICU, 39	Radu	MUNTEANU JR., 12, 29
Marius	MIHALACHI, 27	Doru	MUNTEANU, 28
Pavel	MINDL, 46	Divya	MURALI, 12
Abdellatif	MIRAOUI, 42, 36	Massimo	MUSTICA, 13
Amir Mansour	MIRI, 7, 25	Sorin	MUSUROI, 44
Anca	MIRON, 21, 26	Peter	MUTSCHLER, 23, 27
Mojtaba	MIRSALIM, 43	Marian	NANU, 17
Muguras	MOCOFAN, 22	Mehdi	NASSER, 33
Liviu	MODRAN, 16, 21	Mircea	NEAGOE, 16

OPTIM 2008

Author Index

Marius	NEAGU, 42	Balogh	PÁL, 47	
Monica	NEAGU, 39	Gheorghe	PANA, 12, 22	
Dan	NECSULESCU, 31, 34	Teodor-Crisan	PANA, 14, 24	
Adrian	NEDELCU, 22	Brandusa	PANTELIMON, 25	
Masautso	NGOSI, 10	Vahid	PARIZY, 41	
George	NICOLAE, 21	Saeidpou	Nejila	PARSPOUR, 47
Alexandru	NICOLAE, 53	Mircea	PASCALAU, 21	
Dan Valentin	NICOLAE, 9, 36	Lucia	PASCALE, 16	
Bogdan	NOUR, 40	Vinod	PATEL, 34	
Lucian	OCOLIȘAN, 8	Johannes	PAULIDES, 23	
Petre	OGRUTAN, 21, 22	Adrian	PELCZ, 49	
Ayodeji	OGUNJUYIGBE, 9	Liviu	PERNIU, 49	
Samson		Ioan	PETER, 43	
Olatunji		Dagmar	PETERS-DROLSHAGEN, 48	
Nicolae	OLARESCU, 44	Dorin	PETREUS, 21	
Valeriu		Kresimir	PETRINEC, 15	
Danut I	OLTEAN, 52	Hans-Juergen	PFISTERER, 23	
Jan	ONDRA, 32	Cesare	PICA, 33	
Stefan	ONIGA, 18, 20, 21, 38	Dan	PITICA, 28	
Mihai	ONITA, 22	Mihaela	PLESA, 39	
Bernd	ORLIK, 8, 18	Juriy	PLOTKIN, 23	
Teresa	ORLOWSKA-KOWALSKA, 23, 24, 27, 34	Mojtaba	POOYAN, 41	
Viorel	OSIAC, 40	Florica	POPA, 11	
Mehmet-Efe	ÖZBEK, 13	Valentina	POPA, 16	
Erdem	ÖZYURT, 13	Dan-Cristian	POPA, 45	
Ionuț Raul	PACUREANU, 19	Dorin	POPOVICI, 24, 34	
Mihaela	PAICU, 23			
Codruta				

OPTIM 2008

Author Index

Fahimeh Tahvili Uwe	POUR FARD, 45 PROBST, 47	Shahrokh Martin	SAADATE, 33 SACK, 52
Zoltan	PUKLUS, 36	Seyed Mohammad	SADATI, 42
Raul	RABINOVICI, 46	Bagher Siavash	SADEGHI, 43
Adrian	RADU, 28	Ehsan	SAEIDPOUR, 41
Alin	RADUCU, 16	Florin	SANDU, 12, 13, 22, 50
Mircea M.	RADULESCU, 33	Jurek	SASIADEK, 34
A.	RAHMATI, 27	Radu	SAULESCU, 16, 17
Hassan	RASTEGAR, 41	Ana-Marina	SCAPOLLA, 13
Morteza	RAZZAZ, 19	Adrian	SCHIOP, 45
Andrew	RICHARDSON, 48	Richard	SCHMIDT- OBERMOELLER, 27
Ana	RIVAS, 51	Dominik	SCHUSTER, 23
Dan	ROBU, 50	Petre	SCORTARU, 36, 45
Benoit	ROBYNS, 33	Veronica	SCURTU, 21
Maria Angeles	RODRIGUEZ NEGRO, 39, 51	Gheorghe	SCUTARU, 13, 43
Pedro	RODRIGUEZ, 26	Karl	SEARE, 15
Daniel	ROIU, 23	Dezso	SERA, 16
Mihai	ROMANCA, 14, 21, 22	Emanuel	SERBAN, 10
Richard	ROSLING, 48	Ioan	SERBAN, 10
Claudio	ROSSI, 36	Alexandru	ȘERBĂNESCU, 18
Mircea	ROTARU, 11	Péter	SERFÖZŐ, 29
Mircea	RUBA, 45	Irineu	SETTER, 32
Alberto Parera	RUIZ, 15	Hernandez	
Calin	RUSU, 20	Masound	SHAFIEE, 49
Ioan	RUSU, 20	Mohsen	SHAFIEI RAD, 490
Sergey	RYVKIN, 18, 27, 28, 34, 35	Seyed Mohammad	SHARIATMADAR, 44

OPTIM 2008

Author Index

Marek	SIATKOWSKI, 8	Csaba	SZASZ, 12, 20
Ioan	SILEA, 49, 50	Iuliu	SZEKELY, 12, 29, 30, 50
Fernando	SILVA, 47	Péter	SZOBOSZLAI, 29
Olaf	SIMON, 23	Enikő	SZÖKE, 20
Jean-Jacques	SIMOND, 43	Abdolhosien	TAHANI, 42
Tchapo	SINGO, 33	Sebastian	TARALUNGA, 34
Akassewa		Petrica	TARAS, 30
Francisc	SISAK, 19, 49, 50	Renato	TEIXEIRA, 25
Sorin	SISCA, 16	Alberto	TENCONI, 10, 33
Ciprian	SORANDARU, 44	Remus	TEODORESCU, 14, 15, 16, 26, 33
Edward	SPOONER, 33	Stela	TICUL, 30
Alexander	STAHL, 45	Alin-Sasa	TISAN, 20, 21
Dumitru	STANCIU, 24	Dumitru	TOADER, 25, 26, 41, 51, 52
Kris	STEENHAUT, 22	Gheorghe	TODORAN, 29
Andreas	STEIMEL, 27	Petru	TODOS, 13, 30
Norbert	STEIN, 25	Iulian	TOGOE, 39
Manfred	STIEBLER, 7, 8, 9, 23	Ileana	TORAC, 8, 24
Alin	STIRBAN, 51	Viorel	TRIFA, 46
Dan Alexandru	STOICHESCU, 24	Emil	TRIFU, 46
Olimpiu	STOICUTA, 24	Jan	TURÁN, 29
Cristina	STOLOJESCU, 30	Cornel	TURCU, 19
Larisa	STRETE, 44	Güzin	TÜRKMEN, 13
Marek	ŠTULRAJTER, 18	Lucian	TUTELEA, 3, 6, 37, 47, 48, 51
Constantin	SUCIU, 8	Gavril	URDEA, 49
Mahesh	SWAMY, 7, 32, 36, 37	Behrooz	VAHIDI, 40, 41, 42
Krzysztof	SZABAT, 27		
Lorand	SZABO, 45		
Csaba	SZABO, 8, 45		

OPTIM 2008

Author Index

Dumitru-Mihai	VALCAN, 33	Ion	VLAD, 40, 43, 44
Massimo	VALENTINI, 16	Marius-Cristian	VULPE, 49, 50
József	VÁSÁRHELYI, 29	Anca Diana	VULPE, 50
Radu	VASIU, 22	Robert	WEISSBACH, 15
Marley	VELLASCO, 25, 27, 28, 38	Till	WIEGAND, 48
Arnaud	VERGNOL, 33	Ivan	YATCHEV, 25, 26, 45, 51, 52
Liliana	VICOL, 43	Ali	ZAKEROLHOSSEINI, 21
Andrei	VIDA-RATIU, 20	Cristian	ZET, 29
Alina Cristina	VIOREL, 43, 44	Karin	ZIELINSKI, 18
Ioan-Adrian	VIOREL, 44	Carol	ZOLLER, 25
Ion	VISA, 16, 17	Cristian-Ferruccio	ZORIO, 20
Maria	VISA, 17	Daniela	ZUGA, 40
Jan	VITTEK, 18, 46		
Iulian	VIZITIU, 28		
Constantin			

Plenary session 1

Amir Mansour Miri, University of Karlsruhe, D,
Ion Boldea, *Fellow, IEEE, Politehnica University of Timișoara, RO*,
Manfred Stiebler, *Senior Member, IEEE, Technical University of Berlin, D*.

Plenary session 2

Frede Blaabjerg, *Fellow, IEEE, Aalborg University, DK*,
Ion Boldea, *Fellow, IEEE, Politehnica University of Timișoara, RO*,
Mahesh Swamy, *Yaskawa Electric America, Inc., Waukegan, IL, USA*.

Student Forum 1

Teodor Pana, *Technical University of Cluj-Napoca, RO*,
Ali Deihimi, *Bu-Ali Sina University, Hamedan, Iran*,
Mihai Romanca, *Member, IEEE, Transilvania University of Brasov, RO*.

Student Forum 2

Stefan Oniga, *Member, IEEE, North University of Baia Mare, RO*,

OPTIM 2008

Author Index

Mihai Iordache, *Politehnica* University of Bucharest, RO,
Gheorghe Daniel Andreescu, *Politehnica* University of Timișoara, RO.

Industry News

Dan Neculescu, *Senior Member, IEEE*, University of Ottawa, CA,
Andrew Kingston, TRW Automobile Safety Systems. Koblenz, D,
Alexandru M. Morega, *Member, IEEE, Politehnica* University of Bucharest, RO.

- 1A. Advances in Magnetic Materials
Alexandru Nicolae, *Politehnica* University of Bucharest, RO,
Elena Helerea, *Member, IEEE, Transilvania* University of Brasov, RO,
Jacques Curély, University of Bordeaux, F.
- 1B. Electrical Circuits
Rainer Laur, University of Bremen, D,
Razvan Magureanu, *Politehnica* University of Bucharest, RO,
Lucian Tutelea, *Politehnica* University of Timișoara, RO.
- 1C. Electromagnetic Field, EMC, EMI
Nathan Ida, *Fellow, IEEE*, The University of Akron, USA,
Ivan Yatchev, *Member, IEEE*, Technical University of Sofia, BG,
Dumitru Toader, *Politehnica* University of Timisoara, RO.
- 1E. Electromagnetic Processing of Materials
Nathan Ida, *Fellow, IEEE*, The University of Akron, USA,
Ivan Yatchev, *Member, IEEE*, Technical University of Sofia, BG,
Dumitru Toader, *Politehnica* University of Timisoara, RO.
- 1F. Industrial and Commercial Power Systems
Ivan Yatchev, *Member, IEEE*, Technical University of Sofia, BG,
Elena Helerea, *Member, IEEE*, Transilvania University of Brasov, RO,
Dumitru Toader, *Politehnica* University of Timisoara, RO.
- 1G. Power Quality
Ivan Yatchev, *Member, IEEE*, Technical University of Sofia, BG,
Elena Helerea, *Member, IEEE*, Transilvania University of Brasov, RO,
Dumitru Toader, *Politehnica* University of Timisoara, RO.
- 1H. Advanced Optimization Methods in Electrical and Electronics Engineering
Mahesh Swamy, Yaskawa Electric America, Inc., Waukegan, IL, USA,
Mihai Cistelean, Research Institute for Electrical Machines Bucharest, RO,
Nathan Ida, *Fellow, IEEE*, The University of Akron, USA.
- 2A. Rotary Electrical Machines and Drives, Rotary Actuators

OPTIM 2008

Author Index

- Ion Boldea, *Fellow, IEEE, Politehnica University of Timișoara, RO*,
Manfred Stiebler, *Senior Member, IEEE, Technical University of Berlin, D*,
Dan Ionel, *Member, IEEE, Engineering Fellow - Electromagnetics at A. O. Smith
Corporate Technology Center, Milwaukee, USA*.
- 2B. Linear-Motion Electrical Machines and Drives, Linear-Motion Actuators
Ion Boldea, *Fellow, IEEE, Politehnica University of Timișoara, RO*,
Teresa Orłowska-Kowalska, *Senior Member, IEEE, Wrocław University of
Technology, Wrocław, PL*,
Mihai Cistelecan, Research Institute for Electrical Machines Bucharest, RO.
- 2C. Power Electronics in Drives, Control in Power Electronics
Ion Boldea, *Fellow, IEEE, Politehnica University of Timișoara, RO*,
Teresa Orłowska-Kowalska, *Senior Member, IEEE, Wrocław University of
Technology, Wrocław, PL*,
Mihai Cistelecan, Research Institute for Electrical Machines Bucharest, RO.
- 2D. Power Electronics for Power Systems and Power Quality
Rainer Laur, University of Bremen, D,
Razvan Magureanu, Politehnica University of Bucharest, RO,
Lucian Tutelea, *Politehnica University of Timișoara, RO*.
- 2E. Automotive Power Electronics and Motor Drives. Automotive Electrical Equipment.
Mahesh Swamy, Yaskawa Electric America, Inc., Waukegan, IL, USA,
Mihai Cistelecan, Research Institute for Electrical Machines Bucharest, RO,
Nathan Ida, *Fellow, IEEE, The University of Akron, USA*.
- 2F. Electric, Hybrid and Fuel Cell Vehicles, Control Technics
Mahesh Swamy, Yaskawa Electric America, Inc., Waukegan, IL, USA,
Mihai Cistelecan, Research Institute for Electrical Machines Bucharest, RO,
Nathan Ida, *Fellow, IEEE, The University of Akron, USA*.
- 2G. Renewable Energy Conversion and Control
Frede Blaabjerg, *Fellow, IEEE, Aalborg University, DK*,
Corneliu Marinescu, *Member, IEEE, Transilvania University of Brașov, RO*,
Remus Teodorescu, *Senior Member, IEEE, Aalborg University, DK*,
Marcian Cirstea, *Senior Member, IEEE, Anglia Ruskin University, K*.
- 3A. Control of Linear and Nonlinear Systems, Sensorless Control
Marley Vellasco, Pontifical Catholic University of Rio de Janeiro, BR,
Sergey Ryvkin, *Senior Member, IEEE, Russian Academy of Sciences, RU*,
Corneliu Lazar, *Member, IEEE, Gh. Asachi Technical University of Iasi, RO*.
- 3B. Motion Control, Drive Control, Modelling, Simulation
Michael Braun, University of Karlsruhe, D,
Sergey Ryvkin, *Senior Member, IEEE, Russian Academy of Sciences, RU*,
Vasile Comnac, *Member, IEEE, Transilvania University of Brașov, RO*.

OPTIM 2008

Author Index

- 3C. Signal Processing in Industrial Automation
Michael Braun, University of Karlsruhe, D,
Sergey Ryvkin, *Senior Member, IEEE*, Russian Academy of Sciences, RU
Vasile Comnac, *Member, IEEE*, Transilvania University of Braşov, RO
- 3D. Adaptive and Robust Control
Dorina Isar, *Politehnica University of Timişoara*, RO
Ioan Silea, *Politehnica University of Timişoara*, RO
Rozalina Dimova, *Member, IEEE*, Technical University of Varna, BG
- 3E. Neural Networks, Intelligent Systems
Marley Vellasco, Pontifical Catholic of Rio de Janeiro (PUC-Rio), BR
Sergey Ryvkin, *Senior Member, IEEE*, Russian Academy of Sciences, RU
Corneliu Lazar, *Member, IEEE*, Gh. Asachi Technical University of Iasi, RO
- 3F. Industrial Informatics
Dorina Isar, *Politehnica University of Timişoara*, RO
Ioan Silea, *Politehnica University of Timişoara*, RO
Rozalina Dimova, *Member, IEEE*, Technical University of Varna, BG
- 3G. Communication Systems
Dorina Isar, *Politehnica University of Timişoara*, RO
Ioan Silea, *Politehnica University of Timişoara*, RO
Rozalina Dimova, *Member, IEEE*, Technical University of Varna, BG
- 4A. Electronic Circuits, Network Theory and Microelectronics
Mircea Bodea, *Senior Member, IEEE, Politehnica University of Bucharest*, RO
Iuliu Szekely, *Member, IEEE, Transilvania University of Brasov*, RO
Florin Sandu, *Member, IEEE, Transilvania University of Brasov*, RO
- 4B. Circuits and Systems
Mircea Bodea, *Senior Member, IEEE, Politehnica University of Bucharest*, RO,
Iuliu Szekely, *Member, IEEE, Transilvania University of Brasov*, RO
Florin Sandu, *Member, IEEE, Transilvania University of Brasov*, RO
- 4C. Embedded Systems, Hardware and Software Co-Design
Iuliu Szekely, *Member, IEEE, Transilvania University of Brasov*, RO
Mihaela Morega, *Member, IEEE, Politehnica University of Bucharest*, RO
Leo Ilkko, Oulu University of Applied Sciences, FI
- 4D. Measurements, Data Acquisition and Medical Applications
Iuliu Szekely, *Member, IEEE, Transilvania University of Brasov*, RO
Mihaela Morega, *Member, IEEE, Politehnica University of Bucharest*, RO
Leo Ilkko, Oulu University of Applied Sciences, FI
- 4E. Education in Electrical Technologies

OPTIM 2008

Author Index

Iuliu Szekely, *Member, IEEE*, Transilvania University of Brasov, RO
Mihaela Morega, *Member, IEEE*, Politehnica University of Bucharest, RO
Leo Ilkko, Oulu University of Applied Sciences, FI

4F. Virtual and Remote Laboratories

Gheorghe Scutaru, *Member, IEEE*, Transilvania University of Brasov, RO
Petru Todos, Technical University of Moldova, Chisinau, MD
Yusuf Altun, Belikesir University, TR

John Terhile	AGEE	Assoc. Prof. Dr. Eng., <i>Member, IEEE</i> , University of Botswana, Gaborone, Botswana
Gheorghe-Daniel	ANDREESCU	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , <i>Politehnica</i> University of Timisoara, Romania
Goce	ARSOV	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , <i>Ss. Cyril and Methodius</i> University, Skopje, Macedonia
Elif	AYDIN	Asst. Prof., Dr. Eng., <i>Member, IEEE</i> , <i>Atilim</i> University, Ankara, Turkey
Drago	BAN	Prof. Dr. Eng., <i>Member, IEEE</i> , University of Zagreb, Croatia
Bernard	BARBARA	Prof. Dr. Eng., Laboratoire Louis Néel, Grenoble, France
Iulian	BIROU	Prof. Dr. Eng., Technical University of Cluj-Napoca, Romania
Mircea	BODEA	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , <i>Politehnica</i> University of Bucharest
Ion	BOLDEA	Prof. Dr. Eng., <i>Fellow, IEEE</i> , <i>Politehnica</i> University of Timisoara, Romania
Theodor	BORANGIU	Prof. Dr. Eng., <i>Politehnica</i> University of Bucharest, Romania
Michael	BRAUN	Prof. Dr. Eng., University of Karlsruhe (TH), Germany
Nergiz	CAGILTAY	Asst. Prof. Dr. Eng., <i>Atilim</i> University, Ankara, Turkey
Aurel	CAMPEANU	Prof. Dr. Eng., University of Craiova, Romania
Radu	CAMPEANU	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Transilvania</i> University of Brasov, Romania

OPTIM 2008

Author Index

Domenico	CASADEI	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , University of Bologna, Italy
Mihai	CERNAT	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Transilvania</i> University of Brasov, Romania
Mircea	CHINDRIS	Prof. Dr. Eng., Technical University of Cluj-Napoca, Romania
Romeo	CIOBANU	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , <i>Gheorghe Asachi</i> Technical University of Iasi, Romania
Mihai	CISTELECAN	Dr. Eng., <i>Member, IEEE</i> , Research Institute for Electrical Machines, Bucharest, Romania
Mihai	CIUC	Assoc. Prof. Dr. Eng., <i>Politehnica</i> University of Bucharest, Romania
Radu	CIUPA	Prof. Dr. Eng., <i>Member, IEEE</i> , Technical University of Cluj-Napoca, Romania
Corneliu- Bazil	CIZMAS	Assoc. Prof. Dr. Eng., <i>Transilvania</i> University of Brasov, Romania
Sorin	COATU	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Bucharest, Romania
Vasile	COMNAC	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Transilvania</i> University of Brasov, Romania
Sorin	COTOFANA	Assoc. Prof. Dr. Eng., <i>Senior Member, IEEE</i> , Delft University of Technology, The Netherlands
Aurelian	CRACIUNESCU	Prof. Dr. Eng., <i>Politehnica</i> University of Bucharest, Romania
Jacques	CURELY	Assoc. Prof. Dr. Eng., University of Bordeaux, France
Robin	DE KEYSER	Prof. Dr. Eng., Ghent University, Belgium
Iuliu	DELESEGA	Prof. Dr. Eng., <i>Politehnica</i> University of Timisoara, Romania
Rozalina	DIMOVA	Prof. Dr. Eng., <i>Member, IEEE</i> , Technical University of Varna, Bulgaria
Radu	DOBRESCU	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , <i>Politehnica</i> University of Bucharest, Romania
Virgil	DOBROTA	Prof. Dr. Eng., <i>Member, IEEE</i> , Technical University of Cluj-Napoca Romania

OPTIM 2008

Author Index

Anca	DUTA	Prof. Dr. Eng., <i>Transilvania</i> University of Brasov, Romania
Hulusi Bulent	ERTAN	Prof. Dr. Eng., <i>Member, IEEE</i> , Middle East Technical University, Ankara, Turkey
Attila	FERENCZ	Dahyun Digital Broadcasting Corp., Korea
Janos	FUZI	Prof. Dr. Eng., <i>Transilvania</i> University of Brasov, Romania
Honorius	GALMEANU	Drd. Eng., <i>Transilvania</i> University of Brasov, Romania
Carmen	GERIGAN	Assoc. Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Transilvania</i> University of Brasov, Romania
Luis	GOMES	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , New University of Lisbon (UNINOVA), Portugal
Cristian	GRAVA	Assoc. Prof. Dr. Eng., <i>Member, IEEE</i> , University of Oradea, Romania
Octavian	GRIGORE-MÜLER	Prof. Dr. Eng., <i>Politehnica</i> University of Bucharest, Romania
Ioan Florea	HANTILA	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Bucharest, Romania
Stefan	HARAGUS	Prof. Dr. Eng., <i>Politehnica</i> University of Bucharest, Romania
Alexandru	HEDES	Prof. Dr. Eng., <i>Politehnica</i> University of Timisoara, Romania
Elena	HELEREA	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Transilvania</i> University of Brasov, Romania
Vasile	IANCU	Prof. Dr. Eng., Technical University of Cluj-Napoca, Romania
Nathan	IDA	Prof. Dr. Eng., <i>Fellow, IEEE</i> , University of Akron, United States of America
Leo	ILKKO	Principal Lecturer, Oulu University of Applied Sciences, Finland
Mihai	IODACHE	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Bucharest, Romania
Alexandru	ISAR	Prof. Dr. Eng., <i>Member, IEEE, Politehnica</i> University of Timisoara, Romania
Dorina	ISAR	Prof. Dr. Eng., <i>Politehnica</i> University of Timisoara, Romania

OPTIM 2008

Author Index

Dorin	ISOC	Prof. Dr. Eng., Technical University of Cluj-Napoca, Romania
Angela	JIANU	Dr. Eng., Forschungszentrum Karlsruhe, Germany
Adisa	JIMOH	Prof. Dr. Eng., <i>Member, IEEE</i> , Tshwane University of Technology, Pretoris, South Africa
Sergej	KALASCHNIKOW	Dr. Eng., DANFOSS GmbH Guntramsdorf, Austria
Socrates	KAPLANIS	Prof. Dr. Eng., Technological Educational Institute of Patras, Greece
Vladimir	KATIC	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , University of Novi Sad, Serbia
Liviu	KREINDLER	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Bucharest, Romania
Dan	LASCU	Prof. Dr. Eng., <i>Politehnica</i> University of Timisoara, Romania
Corneliu	LAZAR	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Gh. Asachi</i> Technical University of Iasi, Romania
Pu	LI	Prof. Dr. Eng., Technical University of Ilmenau, Germany
Razvan	MAGUREANU	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Bucharest, Romania
Andrei	MARINESCU	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , Research Development and Testing Institute for Electrical Engineering - ICMET, Craiova, Romania
Corneliu	MARINESCU	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Transilvania</i> University of Brasov, Romania
Richard	MARSCHALCO	Prof. Dr. Eng., Technical University of Cluj-Napoca, Romania
Emil	MICU	Prof. Dr. Eng., <i>Transilvania</i> University of Brasov, Romania
Klaus	MOELLER	Prof. Dr. Eng., Aachen University of Technology (RWTH), Germany
Florin	MOLDOVEANU	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Transilvania</i> University of Brasov, Romania
Alexandru	MOREGA	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , <i>Politehnica</i> University of Bucharest, Romania

OPTIM 2008

Author Index

Mihaela	MOREGA	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Bucharest, Romania
Daniel	MORINIGO	Prof. Dr. Eng., <i>Member, IEEE</i> , University of Valladolid, Spain
Roman	MUSZYNSKY	Prof. Dr. Eng., Poznan University of Tehnology, Poland
Peter	MUTSCHLER	Prof. Dr. Eng., <i>Member, IEEE</i> , Darmstadt University of Technology, Germany
Mircea	NEAGOE	Prof. Dr. Eng., <i>Transilvania</i> University of Brasov, Romania
Dan	NECSULESCU	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , University of Ottawa, Canada
Alexandru	NICOLAE	Prof. Dr. Eng., <i>Politehnica</i> University of Bucharest, Romania
Andrei	NICOLAIDE	Prof. D. Eng., D. Sc., <i>Senior Member, IEEE</i> , <i>Transilvania</i> University of Brasov, Romania
Dan	NICULA	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Transilvania</i> University of Brasov, Romania
Teresa	ORLOWSKA- KOWALSKA	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , Wroclaw University of Technology, Poland
Gheorghe	PANA (4)	Assoc. Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Transilvania</i> University of Brasov, Romania
Sorin	PASCA	Assoc. Prof. Dr. Eng., University of Oradea, Romania
Octavian	PASTRAVANU	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Gh. Asachi</i> Technical University of Iasi, Romania
Ovidiu	PESTEANU	Prof. Dr. Eng., <i>Transilvania</i> University of Brasov, Romania
Ioan	POPA	Prof. Dr. Eng., <i>Member, IEEE</i> , University of Craiova, Romania
Mircea	POPESCU	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Bucharest
Horst	PUTA	Prof. Dr. Eng., Technical University of Ilmenau, Germany
Raul	RABINOVICI	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , <i>Ben-Gurion</i> University of the Negev, Beersheba, Israel
Mircea M	RADULESCU	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , Technical University of Cluj-Napoca, Romania

OPTIM 2008

Author Index

Martin	RIERA_GUASP	Prof. Dr. Eng., <i>Member, IEEE</i> , Polytechnic University of Valencia, Spain
Benoit	ROBYNS	Prof. Dr. Eng., <i>Member, IEEE</i> , High School of Engineering, Lille, France
Mihai	ROMANCA	Prof. Dr. Eng., <i>Member, IEEE</i> , Transilvania University of Brasov, Romania
Enrique	ROMERO- CADAVAL	Prof. Dr. Eng., <i>Member, IEEE</i> , University of Extremadura, Spain
Alex	RUDERMAN	Dr. Eng., Elmo Motion Control Ltd, Petach Tikva, Israel
Sergey	RYVKIN	Dr. Eng., <i>Senior Member, IEEE</i> , Institute of Control Sciences Moscow, Russia
Florin	SANDU	Prof. Dr. Eng., <i>Member, IEEE</i> , Transilvania University of Brasov, Romania
Petre	SCORTARU	Dr. Eng., Transilvania University of Brasov, Romania
Gheorghe	SCUTARU	Prof. Dr. Eng., <i>Member, IEEE</i> , Transilvania University of Brasov, Romania
Ioan	SILEA	Prof. Dr. Eng., Politehnica University of Timisoara, Romania
Costin	STEFANESCU	Prof. Dr. Eng., Politehnica University of Bucharest, Romania
Andreas	STEIMEL	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , Ruhr University, Bochum, Germany
Manfred	STIEBLER	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , Technical University of Berlin, Germany
Constantin	SUCIU	Assoc. Prof. Dr. Eng., <i>Member, IEEE</i> , Transilvania University of Brasov, Romania
Zoltán	SÜTŐ	Drd. Eng., Budapest University of Technology and Economics, Hungary
Iuliu	SZEKELY	Prof. Dr. Eng., <i>Member, IEEE</i> , Transilvania University of Brasov, Romania
Rui-Santos	TAVARES	Prof. Dr. Eng., Universidade Nova de Lisboa, Portugal
Remus	TEODORESCU	Prof. Dr. Eng., <i>Senior Member, IEEE</i> , Aalborg University, Denmark

OPTIM 2008

Author Index

Petru	TODOS	Prof. Dr. Eng., Technical University of Moldova, Chisinau
Gülay	TOHUMOGLU	Prof. Dr. Eng., <i>Member, IEEE</i> , University of Gaziantep, Turkey
Marina Dana	TOPA	Prof. Dr. Eng., <i>Member, IEEE</i> , Technical University of Cluj-Napoca, Romania
Ileana	TORAC	Prof. Dr. Eng., <i>Member, IEEE</i> , Romanian Academy-Timisoara Branch, Romania
Tiberiu	TUDORACHE	Senior Lecturer, Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Bucharest, Romania
Lucian N.	TUTELEA	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Timisoara, Roman
Stanimir	VALTCHEV	Prof. Dr. Eng., Universidade Nova de Lisboa, FCT, Portugal
Marley	VELLASCO	Prof. Dr. Eng., <i>Senior Member</i> , Pontificia Universidade Católica do Rio de Janeiro, Brasil
Constantin	VERTAN	Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Bucharest, Romania
Ioan Adrian	VIOREL	Prof. Dr. Eng., <i>Member, IEEE</i> , Technical University of Cluj-Napoca, Romania
Jan	VITTEK	Prof. Dr. Eng., University of Zilina, Slovak Republic
Gheorghe	VUC	Assoc. Prof. Dr. Eng., <i>Member, IEEE</i> , <i>Politehnica</i> University of Timisoara, Romania
Helmut	WEISS	Prof. Dr. Eng., University of Leoben, Austria
Liudong	XING	Assoc. Prof. Dr. Eng., <i>Senior Member, IEEE</i> , University of Massachusetts, Dartmouth, USA
Joseph	YAN	Lecturer, Dr. Eng., University of Liverpool, UK
Ivan	YATCHEV	Assoc. Prof. Dr. Eng., <i>Member, IEEE</i> , Technical University of Sofia, Bulgaria

OPTIM 2008

Author Index

**12th International Conference on
OPTIMIZATION OF ELECTRICAL AND ELECTRONIC EQUIPMENT:
OPTIM 2010**

May 20-22, 2010, Braşov/Moieciu *Cheile Gradistei* Complex, Romania

Organized by:

Faculty of Electrical Engineering and Computer Science,
Transilvania University of Brasov

In cooperation with:

Faculty of Electrical Engineering, University *Politehnica* of Timisoara
Faculty of Electrical Engineering, Technical University of Cluj-Napoca
Romanian Academy, Romanian Academy of Technical Sciences,
Romanian Electrotechnical Committee

Technically Sponsored by:

IEEE-IAS, -PELS, -IES, -PES & IEEE Romania Section
IET - The Institution of Engineering and Technology & IET Romania Section

Topics:

Electrotechnics

Electric Circuits and Networks,
Electromagnetic Field, Electrostatic Processes, EMC/EMI
Magnetic Materials, Passive Components and Materials
Electromagnetic Processing of Materials, Electromagnetic heating
High Voltage Technique: Discharges, Insulation
Electric Arc: Modelling, Simulation, CAD; Electrical Apparatus

OPTIM 2008

Author Index

Industrial and Commercial Power Systems: Transients, Short Circuits; Rural Electric Power; Distributed Generation Systems
Power Quality and Utility Applications, Power System Protection, Earthing, Lightning
Lightning Applications

Applications of Electrical Engineering in Medicine and Biology
Safety and Reliability in Power Engineering

Power Electronics, Electrical Machines & Industrial Drives

Rotary and Linear-Motion Electrical Machines and Drives, Actuators
Electric Generators and their Control
Power Electronics in Drives, Control in Power Electronics
Electric Propulsion on Trains, Vessel, Urban People Movers
High Power Converters, Low Power Converters, Switching Converters
Automotive Power Electronics and Motor Drives, Automotive Electrical Equipment
Electric, Hybrid and Fuel Cell Automobiles
Mechatronics, Optomechatronics, Human-Adaptive Mechatronics,
Robotics, Mobile Autonomous Systems
Renewable Energy Conversion and Control, Distributed systems

Industrial Automation and Control

Control of Linear and Non-linear Systems, Sensorless Control
Motion Control, Drive Control, Modelling, Simulation, Signal Processing
Adaptive and Robust Control, Variable Structure Control, Petri Nets, Neural Networks, Intelligent Systems
Industrial Informatics, Software Engineering, Process Control,
Communication Systems,
CAD Tools and Multimedia, Human-Machine Interface Technology
Safety and Reliability in Automation

Applied Electronics

Power Electronics Components and Devices: Modelling, Simulation;
Discrete and Integrated Semiconductors,
DSP and Microcontrollers for Power Electronics and Motion Control
Circuits & Systems, Microsystems, Nanotechnologies
Symbolic Approaches on Electronics
Embedded Systems, Hardware & Software Co-Design
Measurements and Data Acquisition, Metrology
Audio and Video Signal Processing
Applications of Electronic Engineering in Medicine and Biology
Safety and Reliability in Electronics

Electrical Engineering Education

Education in Electrical Technologies
New Educational Tools including Information and Communication Technologies
Introducing Information and Communication Technologies in the Laboratories

OPTIM 2008

Author Index

Distance Learning, Continuous Learning, New Materials, New Methods
University-Industry Collaboration

Industry news

Student forum

Schedule for paper submission:

Full paper deadline:	February 15, 2010
Notification of acceptance:	March 15, 2010
Photo-ready copies and Registration fees:	April 5, 2010

Submission:

Selection will be based upon full length 6 or 8 A4 pages paper proposals in IEEE double column format. Only contribution papers are accepted. Practical (experience based) contributions from industry are mostly welcome. Please make sure that your paper is the best it can be when you send it by Email. You will be invited to make corrections in accordance with reviewers' recommendations.

OPTIM Authors Guide may be downloaded from the site.

We expect to have again a conference with 170-200 papers or more (OPTIM '08 had about 200 papers from 28 countries). The papers are planned to be presented in 3 parallel oral lines of sessions with poster sessions to cover for the rest of the papers. We will have 3-4 keynote addresses from world-renowned personalities and international high tech Companies, to be presented in special plenary sessions. There will be 2 full conference days (Thursday May 20 and Friday May 21) with day 3 (Saturday May 22, 2010) for cultural events for all participants.

Load your submission on the site <http://info-optim.ro>. Please load blind (anonymized) files in Adobe Acrobat (.pdf). On the site you are invited to complete a form containing the title of the paper, the authors (names, affiliation, E-mail address, mailing address, phone and fax numbers), the corresponding author, and the topic area.

Accepted Papers:

All submitted papers will be reviewed by members of the International Steering Committee and the corresponding author will be notified of acceptance or rejection. Accepted papers must be presented at the conference (an author could present maximum two (2) papers) and will be published in the conference Proceedings.

The best (graded by the reviewers' scores) 20% of papers presented (the session and date will be mentioned) at OPTIM 2010, with the author's approval, will be sent by the organizers of OPTIM-10 and will be considered for review for eventual publication in **IEEE Trans. Vol. IA, PEL, and IE**, provided their content falls into the scope of these Journals. More details will be given on site at OPTIM 2010. **This is a result of continuing technical sponsorship from IEEE-IAS, -PELS, and -IES.**

Papers from OPTIM 2010 will be included in the **IEEE Xplore** data base. Papers from OPTIM 2010 may also be considered, by author's initiative or by invitation, for

OPTIM 2008

Author Index

final review and speedy publication in the new Internet-only international archival journal: "Journal of Electrical Engineering"; please visit: "www.jee.ro".

Conference Language:

The official language of the Conference is English. It will be used for all printed materials, presentations and discussions.

Registration fees (bank transfer taxes not included):

350 EUR (or equivalent in USD) for each participant (author or not author), includes attendance at all scientific programs, conference bagged (the programme, proceedings in volumes and CD form), invitations to the welcome reception and the banquet, daily meals, transport by bus organized from and to the Bucharest International Airport, one trip from the list of the proposed ones.

250 EUR (or equivalent in USD) for each companion (not author or co-author), includes invitation to the welcome reception and the banquet, daily meals, transport by bus organized from and to the Bucharest International Airport, three trips from the list of the proposed ones.

IEEE, IET, VDE members have to pay a reduced fee.

Accommodations

We will arrange a wide variety of accommodations by request at prices from, approximately, 40 Euro/night/room in good quality family hotels to probably up to 70 Euro/night/room in 3 stars hotels within the Complex *Cheile Gradistei* Complex in Moeciu/Brasov and nearby.

For students and PhD students double rooms at about 20 Euro/night/student in Motels and Pensions near the Conference venue.

Conference Location:

The OPTIM 2010 Conference will be held in the new mountain Recreation Complex: *Cheile Gradistei* of Moeciu/Brasov, 200 km north of Bucharest, and 30 km away from Brasov in a spectacular mountain environment. We will provide transfer by minibus from (to) International Airport in Bucharest.

For more information contact:

Email: optim@info-optim.ro

URL: <http://www.info-optim.ro>

Prof. Ion Boldea, *Fellow, IEEE*, OPTIM 2010 General Chair, boldea@lselinux.utt.ro

Prof. Mihai CERNAT, *Member, IEEE*, OPTIM 2010 Program Chair

Transilvania University of Brasov, Faculty of Electrical Engineering and Computer Science, Bd. Eroilor 29, 500036 Braşov, Romania

Tel. +40-724-794799, Tel., Fax: +40-268-474718, +30-268-410525

E-mail: m.cernat@unitbv.ro, mihaicernat@yahoo.com

International Steering Committee

Past Honourary Chairs:

Thomas A. LIPO, Wisconsin State University, Madison, WI, USA

Michel POLOUJADOFF, *Pierre et Marie Curie* University VI of Paris. F

Dierk SCHRÖDER; Technical University of Munich, D

OPTIM 2008

Author Index

Toma DORDEA, Romanian Academy, Timisoara Branch, RO
Manfred STIEBLER, Technical University of Berlin, D
Amir MIRI, University of Karlsruhe, D

Honourary Chair:

Rik DE DONCKER, Technical University of Aachen, D
Robert D. LORENZ, Wisconsin State University, Madison, WI, USA

Conference Chair:

Ion BOLDEA, *Politehnica* University of Timisoara, RO

Conference Program Chair

Mihai CERNAT, *Transilvania* University of Brasov, RO

Conference Program Advisors

Sandor HALASZ, Budapest University of Technology and Economics, HU
Vladimir KATIC, Technical University of Novi Sad, SRB
Viliam FEDAK, University of Kosice, SK
Ivan YATCHEV, Technical University of Sofia, BG
Goce ARSOV, *SS. Cyril and Methodius* University, Skopje, MK
H. Bulent ERTAN, Middle East Technical University, Ankara, TR
Raul RABINOVICI, Ben Gurion University of the Negev, Beersheba, IL
Luis GOMES, New University of Lisbon, PT
Marcian CIRSTEA, Anglia Ruskin University, Camridge, UK
Andreas STEIMEL, Ruhr University Bochum, D
Robin DE KEYSER, Ghent University, BE
Sergey RYVKIN, Trapeznikov Institute of Control, Moscow, SU
Johann W. KOLLAR, Zurich University of Technology, CH
Adisa JIMOH, Tshwane University of Pretoria, South Africa
Maria IOANNIDES, National Technical University of Athens, GR

Local Technical Committee:

Co-chair

Sorin MORARU, Dean, Faculty of Electrical Eng. and Comp. Science,
Transilvania University of Brasov, RO
Petru ANDEA, Dean, Faculty of Electrical Engineering,
Politehnica University of Timisoara, RO
Radu CIUPA, Dean, Faculty of Electrical Engineering,
Technical University of Cluj-Napoca, RO

Members

Gheorghe SCUTARU, *Transilvania* University of Brasov, RO
Corneliu MARINESCU, *Transilvania* University of Brasov, RO
Radu MUNTEANU, Technical University of Cluj-Napoca, RO
Mircea RĂDULESCU, Technical University of Cluj-Napoca, RO
Mihai ROMANCA, *Transilvania* University of Brasov, RO
Lucian IULIAN, *Transilvania* University of Brasov, RO
Francisc SISAK, *Transilvania* University of Brasov, RO

OPTIM 2008

Author Index

Gheorghe Daniel ANDREESCU, *Politehnica* University of Timisoara, RO
Maria IMECS, Technical University of Cluj-Napoca, RO
Vasile COMNAC, *Transilvania* University of Brasov, RO
Ioan SILEA, *Politehnica* University of Timisoara, RO
Clement FEȘTILĂ, Technical University of Cluj-Napoca, RO
Iuliu SZEKELY, *Transilvania* University of Brasov, RO
Alexandru ISAR, *Politehnica* University of Timisoara, RO
Marina ȚOPA, Technical University of Cluj-Napoca, RO

Keynote addresses:

There will be 4 keynote addresses (2 from Industry and 2 from Academia) delivered by worldwide established personalities (companies) within two plenary sessions.

OPTIM 2010

First announcement and Call for papers

Call for Industry

Call for

"New Products Presentation Papers from Industry oral session and exhibition"

for OPTIM-2010, May 20-22, 2008, Brasov/Moeciu *Cheile Gradistei* Complex, Romania
(www.info-optim.ro)

1. The scope:

The biannual International Conference "Optimization of Electrical and Electronic Equipment (OPTIM)" in its 2010 event organizes an industry exhibition and a special oral session "Industry's news" where small, average and big companies may present in ENGLISH (within 15 minutes) their new products in Power Electrical and Electronics Engineering

2. Fees

The fee for the renting of an exhibition booth (12 m², with a table, chairs, lateral and back panels and an electric power socket, for May 22 and 23) is 250 Euro.

The presentation in the oral session has a fee of only 100Euro/presentation. We urge to apply for both but you may choose also either the exhibition booth or the oral session presentation. All participants at OPTIM 2010 benefit of one free trip in May 22, the third (cultural) day of the Conference, which facilitates new contacts and friendships, as massively proven by previous OPTIM biannual events.

3. Venue

Brasov/Moeciu/"Cheile Gradistei" Complex

4. Motivation

OPTIM biannual events are technically sponsored by IEEE-IAS, -PELS, -IES and by IET and that about 50% of the about 140-150 papers come from abroad (above 25 countries). Interested beneficiaries of "Industry's news" product presentation special oral session and exhibition will be invited to attend OPTIM 2010.

So, the industry Forum started at OPTIM 2010 will continue biannually with a progressively better interfacing of producers and users of "Power Electrical and Electronics Products".

5. How to apply

Contact the Program Chair, Prof. Mihai Cernat (m.cernat@unitbv.ro), after visiting www.info-optim.ro

6. Deadline for applications : March 15, 2010.

Looking forward to meet you in May at OPTIM 2010 in Brasov/Moeciu *Cheile Gradistei* Complex;

General Chair: Prof. Ion Boldea, *Fellow, IEEE*

Program Chair, Prof. Mihai Cernat, *Member, IEEE*