

Japan- Korea Joint Technical Workshop on Semiconductor Power Converter

Date October 21 (Friday) 2011 14:00-18:00
October 22(Saturday) 2011 8:30-18:00

Venue

Fukuoka University Seminar House (Oct. 21st and 22nd)
3-4-20, Ropponmatsu, Tyuouku, Fukuoka, Fukuoka
TEL : 092-751-8141
<http://www.adm.fukuoka-u.ac.jp/fu811/home1/seminar/index.html>

Sponsored by

Semiconductor Power Converter (SPC) Technical Committee
Industry Applications Society, IEE of Japan
Korean Institute of Power Electronics (KIPE)

Co-Sponsored by

IEEE PELS Fukuoka Chapter
Kyushu Chapter, IEE of Japan

Subject: General semiconductor power converters

Program

1st session October 21 (Friday) 14:00-16:00

14:00-14:15 Opening ceremony

Chair Toshihisa Shimizu (Tokyo Metropolitan University)

Jaeho Choi (Chungbuk National University)

14:15-14:45 Recent Status and Trend of Research on Power Electronics in Japan

IEEJ-SPC-01 ○Yukihiko Sato (Chiba University) 1

14:45-15:15 Smart Grid Development in Taiwan — Toward a Sustainable Future —

IEEJ-SPC-02 Chia-Chi Chu (National Tsing Hua University)

Faa-Jeng Lin (National Central University)

○Po-Tai Cheng (National Tsing Hua University) 5

15:15-15:45 Emerging Technologies for Multilevel Converters in Japan

IEEJ-SPC-03 ○Hideaki Fujita (Tokyo Institute of Technology) 11

15:45-16:00 Coffee Break

2nd session October 21 (Friday) 16:00-18:00

Chair: Tomoki Yokoyama (Tokyo Denki University)

Hag-Wone Kim (Chungju National University)

- 16:00-16:30 Parallel Operation of Trans-Z-Source Inverter
KIPE-SPC-01 Honnyong Cha,
○Sanghyup Han, Heung-Geun Kim (Kyungpook National University)
Dong-Wook Yoo (Korea Electrotechnology Research Institute) 17
- 16:30-17:00 Evaluation of Power Density and Efficiency Limit for Multilevel Converters
IEEJ-SPC-04 ○Jun-ichi Itoh, Yugo Kashihara (Nagaoka University of Technology) 23
- 17:00-17:30 A Novel Dummy Load for 40W Fluorescent Lamp
KIPE-SPC-02 ○Bohwan Choi, Hyunjae Kim, Inyong Yeo (KAIST)
Bongcheol Kim (OPTOMIND Company)
Chun-Taek Rim (KAIST) 29
- 17:30-18:00 Single Independent DC Voltage Source Driving of Cascaded H-bridge Multilevel Inverter
KIPE-SPC-03 Using Flyback Converter with Multiple Secondary of Transformer
○Cheol-soon Kwon,
Seong Hye Kim, Feel-soon Kang (Hanbat National University) 35

Presentation time: 25 minutes and 5 minutes for discussion.

Poster session I October 22 (Saturday) 8:30-10:00

Chair Junnosuke Haruna (Tokyo University of Science)

Cheewoo Lee (Kyungsoong University)

- IEEJ-SPC-05 Experimental Verification of Induced Noise Voltage on Laminated Bus Bar Structure
○Zen-nosuke Ariga, Keiji Wada (Tokyo Metropolitan University) 39
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- IEEJ-SPC-06 Line Loss Minimization in a Loop Distribution System using a Matrix Converter
○Hidehiko Nakazawa, Takaharu Takeshita (Nagoya Institute of Technology) 45
- KIPE-SPC-05 Multi-level Inverter Capable of Power Factor Control with DC Link Switch
○Ho-Dong Sun,
Honnyong Cha, ○Heung-Geun Kim (Kyungpook National University)
Tae-Won Chun (University of Ulsan)
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- IEEJ-SPC-07 Experimental Discussions on Inductor Current Balance Control for Interleaved Boost Converter
○Tomohiro TAKAYANAGI
Nobukazu HOSHI, Junnosuke HARUNA (Tokyo University of Science)
Meifen CAO (Toyko Metropolitan College of Industrial Technology) 55

KIPE-SPC-06	Advanced 4-level Switching Topology for the High Speed SRM ○Geun-min Lim, Seung-Ho Baek, Jong-Hun Lee, Jin-Woo Ahn, Dong-Hee Lee (Kyungsoong University) ······	59
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Chair: Keiji Wada (Tokyo Metropolitan University)

Dong-Hee Lee (Kyungsoong University)

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H. G. Kim (Kyungpook University)
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○Yusuke Fujita,
Satoshi Miyawaki, Jun-ichi Itoh (Nagaoka University of Technology)143

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11:30-11:45 Closing ceremony

* Poster presentation: size : A0 (841 x 1189mm) 1 page.

12:15 Transfer bus for technical visit (Lunch box in Bus)

15:00-16:00 Technical visit

Kyusyu electric power co. Inc. Hattyoubaru geothermal Power Plant
http://www.kyuden.co.jp/effort_geothermal_t_hattyoubaru.html

16:15 Transfer bus for Hotel

18:00-19:00 Special session (Aso Plaza hotel)
 Education for Power Electronics

Registration Fee

- Full Conference Registration 60,000 Yen
Including Technical conference (¥30,000), Travel expense (¥4,000) for the technical visit and stay in Aso (¥8,000), Participation fee for Technical visit and Special session (¥18,000).
- Student Registration 5,000 Yen (Only for the technical session)
- Only technical conference Registration 30,000 Yen

*Registration Fee MUST be paid by only **Cash** (Japanese yen)

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