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Proposal for ISIE 2013 Special Session Should be Sent to the SS chairs

Prof. Kim Man EEKMAN@cityu.edu.hk

Prof. Juan José Rodríguez Andena jjrdguez@uvigo.es

Prof. Armando Walter Colombo awcolombo@et-inf.fho-emden.de

Special Session on:

CONTROL AND FILTERING FOR NETWORKED SYSTEMS

- **Special Session Organizers (names and contact emails):**

Professor Qing-Long Han

q.han@cqu.edu.au (IEEE IES TC NBCS)

Professor Josep M. Fuertes

josep.m.fuertes@upc.edu (IEEE IES TC NBCS)

Professor Mo-Yuen Chow

chow@ncsu.edu (IEEE IES TC NBCS)

- **Technical Outline of the Session (50 words) and Topics:**

Networking technologies are widely used for data communication and information change. It is becoming more important how to apply such technologies to modern industrial/control systems with a large number of distributed sensors and actuators. The advanced networking technologies have provided a low-cost solution for effective distributed information processing and controlling, resulting in flexible architecture and reduction of installation and maintenance costs. Consequently, networked control and filtering are the current trend for industrial automation and have applications in a broad range of areas, such as mobile sensor networks, remote surgery, haptics collaboration over the Internet, and automated highway system and unmanned aerial vehicles.

This special session is to investigate the control and filtering for networked systems in industrial electronics areas. Topics of interest are included but not limited to:

- Event-triggered control
- Event-triggered filtering
- Network resource scheduling and control
- Network bandwidth and control
- Communication protocol and control
- Network dynamics and control and filtering
- Network-based leader-following consensus
- Network-based tracking control
- Distributed sensing and filtering
- Fault-tolerance in network-based control systems
- Distributed wireless networks for control and filtering
- Sampled-data control and filtering
- Industrial communication and control systems

- **Potential Contributing Authors (names and emails):**

Qing-Long Han	q.han@cqu.edu.au
Josep M. Fuertes	josep.m.fuertes@upc.edu
Mo-Yuen Chow	chow@ncsu.edu
Fuwen Yang	f.yang@cqu.edu.au
Jia Wang	j.wang@cqu.edu.au
Yufeng Lin	y.lin@cqu.edu.au
Xian-Ming Zhang	x.zhang@cqu.edu.au
Xiaohua Ge	x.ge@cqu.edu.au
Chen Peng	c.peng@cqu.edu.au
Dong Yue	medongy@vip.163.com
Lei Ding	l.ding@cqu.edu.au
Alfonso Baños	abanos@um.es
Seta Bogosyan	sbogosyan@alaska.edu
Michelle Brischetto	mbrischetto@diit.unict.it
Elizabeth Chang	Elizabeth.Chang@cbs.curtin.edu.au
Ramez Daoud	rdaoud@aucegypt.edu
Paulo Gil	psg@fct.unl.pt
Hideki Hashimoto	hashimoto@iis.u-tokyo.ac.jp
J.J. Lee	jjlee@ee.kaist.ac.kr
Suk Lee	slee@pusan.ac.kr
Hao Ma	mahao@zjuem.zju.edu.cn
Marga Marcos	marga.marcos@ehu.es
Oracio Mirabella	omirabel@diit.unict.it
Marek Miskowicz	miskow@agh.edu.pl
Kenji Natori	natori@ee.aoyama.ac.jp
Roberto Oboe	oboe@gest.unipd.it
Kouhei Ohnishi	ohnishi@sd.keio.ac.jp
Unnati Ojha	uojha@ncsu.edu
Ignacio Peñarrocha	ipenarro@esid.uji.es
Felix Perez	felixperez@um.es
Teresa Riesgo	teresa.riesgo@upm.es
Julio-Ariel Romero	romeroj@esid.uji.es
Julian Jose Salt	julian@isa.upv.es
Roberto Sanchís	rsanchis@esid.uji.es
Young Hun Song	aoi.moonlight@gmail.com
Yodyium Tipsuwan	yodyium@gmail.com
Ugur Tumerdem	ugur@sum.sd.keio.ac.jp
Yutaka Uchimura	uchimura@shibaura-it.ac.jp
Qixin Wang	csqwang@comp.polyu.edu.hk
Shaun Yang	s.h.yang@lboro.ac.uk
Daisuke Yashiro	yasshi@sum.sd.keio.ac.jp
Xinghuo Yu	x.yu@rmit.edu.au

- **Potential Reviewers (names and emails):**

The potential contributing authors will serve as potential reviewers.

- **IES Technical Committee Sponsoring the Special Session (if any):**

The IES Technical Committee on Network-Based Control Systems and Applications sponsors this Special Session.