193rd Division Meeting

Dynamics Systems and Control Division, ASME International

2018 American Control Conference

Milwaukee, Wisconsin, *Wisconsin Center*

Date and Time: Wednesday, June 27, 2018 at 7:30 pm
Location: Ballroom D

A G E N D A

7:30 PM	Social – light refreshments will be provided.		
8:00 PM	1.	Preliminaries and Self-Introductions	Peter Meckl
		Peter called for the meeting around 8 pm and all attendees introduced themselves.	
8:10 PM	1.1	Recognize student travel grant recipients	Carrie Hall
		Carrie introduced all students travel awardees who attended the meeting.	
8:20 PM	2.	Approval of Minutes	Peter Meckl
		Peter moved the motion to approve the minutes at 2017 DSCC and all members approved the minutes. Peter also mentioned about the DSCD opening positions and call for nominations.	
8:30 PM	3.	New ASME Conference budget model	Edmond Valpoort
		Edmond presented the ASME update on conference budget and others. Please see the attached report for details.	
9:00 PM	4.	Update from NSF	Dawn Tilbury
		Dawn presented the recent NSF updates. The details are in the attached report.	
	Reports:		
9:15 PM	5.	Conference Activities (5 minutes per report)	
	5.1	2018 ACC	Carrie Hall
		Carrie presented the ASME participation data in 2018 ACC. The details are in the attached report.	
	5.2	2018 AIM	Kok-Meng Lee
		Kok-Meng cannot attend the meeting and a report was sent by him on behalf of the General Chair of 2018 AIM. Jingang presented the report briefly and the report is attached.	
	5.3	2019 AIM	Kok-Meng Lee
		Kok-Meng cannot attend the meeting and a report was sent by him on behalf of the General Chair of 2019 AIM. Jingang presented the report briefly and the report is attached	
	5.4	2018 DSCC	Xiaobo Tan

Xiaobo presented the 2018 DSCC update. The details are in the attached report.

5.5 2019 DSCC — Kam Leang

Kam presented the 2019 DSCC update. The details are in the attached report.

5.6 DSCC Steering Committee/2020 DSCC — Santosh Devasia

Santosh presented the DSCC Steering Committee update. Please see the attached report.

5.7 2018 ISFA — Robert Landers

Robert presented the 2018 ISFA update. The details are in the attached report.

9.50 PM 6. Public Relations and Outreach (5 minutes per report)

6.1 Student and Young Professional Committee — Carrie Hall

Carrie presented the activity and status update. The details are in the attached report.

6.2 Newsletter — Xu Chen

Xu presented the Newsletter update and a sample newsletter; see the attached report.

6.3 DSCD Website — Jeff Shelton

Jeff cannot make the meeting and the attached report was briefly presented by Jingang.

6.4 DSC Magazine — Peter Meckl

Peter presented the DSC Magazine update. The details are in the attached report

10:10 PM 7. Standing Committee Reports (5 minutes per report)

7.1 Honors and Awards Committee — Dawn Tilbury

Dawn reported the update on H&A committee and the report is attached.

7.2 Advisory Committee — George Chiu

George sent an email and no active update from the committee.

10:20 PM 7. Open discussion — Peter Meckl

Peter called for any open discussions and no significant item was discussed.

10:30 PM 8. Closure — Peter Meckl

The meeting was adjourned around 9:40 pm

Jingang Yi

DSCD Secretary

DSCD Opening Positions

- **Honors Committee members**
- **DSCD Conference Editorial Board (CEB) Chair**
- **ACC Program Representative**
- **Newsletter Associate Editors**

Please send your nominations to

Professor Peter Meckl (meckl@purdue.edu)

Self-nominations are welcome!

Tiger Team on Segregated Accounts

- Divisions have raised concern since the July 2014 reorganization as to the future of conference budgeting and their Segregated Accounts
- Members have expressed that they no longer feel a sense of ownership of their conferences nor feel incentivized to reach targeted goals and budgets
- Questions were also raised over the amount of overhead being charged to conferences
- An analysis of the 1st half of FY 2018 conferences shows that ASME missed revenue targets on 11 of 15 conferences and net surplus targets on 12 of 15 conferences.

New BoG Conference Financial Model

- Lower the conference labor overhead rate from 30% to 15% of total revenues for FY 2019-2021
- Should a conference meet its revenue targets and create a net surplus, the surplus should be shared:
  - 50% to the Division's Segregated Account
  - 25% to the TEC Sector Development Fund
  - 25% to the ASME General Fund
- Should a deficit occur, the same percentages will be used to spread that amount

New BoG Conference Financial Model

- Multi-Division conferences will share their surplus according to a ratio of content provided by each Division
- Investment losses and gains on the balances of Segregated Accounts should remain in the ASME General Fund
- Guidance on the recommended and not recommended uses of Segregated Accounts is defined
- Consistent programmatic aspects should be planned for all conferences

TEC Development Fund

- New TEC Development Fund proposed, initially $150,000 for FY19
- Intended to promote new initiatives and adoption of common conference elements by ASME Technical Divisions running existing ASME's paper-based technical conferences
- Common elements include:
  - Student competitions
  - Early career engineer programs
  - Sessions on standards needs and gaps
  - Tutorials and workshops
  - Promote cross-sector participation
  - Tracks focused on the strategic technology areas
- Processes will be developed and disseminated; concept includes:
  - TEC Council control of the fund
  - Annually solicitation of proposals from Technical Divisions and SLTs
  - Proposal review and award selection by TEC Council

DYNAMIC SYSTEMS & CONTROL
FUND 4-0105

Program Report

Statement of Revenue & Expense as of 1/31/2018

Prior Year FY2017			Reporting Year FY2018				FY2018	
FYTD January Actual	FYE Actual		January Budget	January Actual	FYTD January Bdgt	FYTD January Actual	Budget	Forecast
		Revenue						
		Reimbursements						
0.00	0.00	3801 Expense Reimbursement	0.00	0.00	0.00	1,585.95	0.00	0.00
0.00	0.00	**TOTAL Reimbursements**	0.00	0.00	0.00	1,585.95	0.00	0.00
		Membership						
(1,761.00)	(1,761.00)	3613 Member Contribution	0.00	(1,585.00)	0.00	(1,585.00)	0.00	0.00
(1,761.00)	(1,761.00)	**TOTAL Membership**	0.00	(1,585.00)	0.00	(1,585.00)	0.00	0.00
		Non-Operating Revenue						
(2,689.59)	(3,836.04)	3612 Dividend&Interest Dist	0.00	(217.30)	0.00	(2,604.93)	0.00	0.00
(3,128.46)	(7,373.43)	4507 Realized Gain Loss	0.00	(322.99)	0.00	(1,051.37)	0.00	0.00
(11,257.86)	(16,249.70)	4510 Unrealized Gain Loss	0.00	(7,458.52)	0.00	(21,870.40)	0.00	0.00
(17,075.91)	(27,459.17)	**TOTAL Non-Operating Revenue**	0.00	(7,998.81)	0.00	(25,526.70)	0.00	0.00
(18,836.91)	(29,220.17)	** TOTAL Revenue **	0.00	(9,583.81)	0.00	(25,525.75)	0.00	0.00
(18,836.91)	(29,220.17)	** Report Sub-Total **	0.00	(9,583.81)	0.00	(25,525.75)	0.00	0.00
		Expense						
		Direct Cost of Products & Services						
0.00	0.00	6418 Brochures	0.00	0.00	0.00	433.00	0.00	0.00
0.00	600.00	6425 On Line Hosting	0.00	0.00	0.00	0.00	0.00	0.00
0.00	600.00	**TOTAL Direct Cost of Products & Services**	0.00	0.00	0.00	433.00	0.00	0.00
		General Office - Controllable						

DYNAMIC SYSTEMS & CONTROL
FUND 4-0105

Program Report

Statement of Revenue & Expense as of 5/31/2018

Prior Year FY2017			Reporting Year FY2018				FY2018	
FYTD May Actual	FYE Actual		May Budget	May Actual	FYTD May Bdgt	FYTD May Actual	Budget	Forecast
		Revenue						
		Reimbursements						
0.00	0.00	3801 Expense Reimbursement	0.00	0.00	0.00	1,585.95	0.00	0.00
0.00	0.00	**TOTAL Reimbursements**	0.00	0.00	0.00	1,585.95	0.00	0.00
		Membership						
(1,761.00)	(1,761.00)	3613 Member Contribution	0.00	0.00	0.00	(1,585.00)	0.00	0.00
(1,761.00)	(1,761.00)	**TOTAL Membership**	0.00	0.00	0.00	(1,585.00)	0.00	0.00
		Non-Operating Revenue						
(3,552.22)	(3,836.04)	3612 Dividend&Interest Dist	0.00	(210.77)	0.00	(3,501.82)	0.00	0.00
(7,248.60)	(7,373.43)	4507 Realized Gain Loss	0.00	(141.24)	0.00	(1,563.76)	0.00	0.00
(16,098.02)	(16,249.70)	4510 Unrealized Gain Loss	0.00	(1,975.15)	0.00	(13,906.65)	0.00	0.00
(26,898.84)	(27,459.17)	**TOTAL Non-Operating Revenue**	0.00	(2,327.16)	0.00	(18,972.23)	0.00	0.00
(28,659.84)	(29,220.17)	** TOTAL Revenue **	0.00	(2,327.16)	0.00	(18,971.28)	0.00	0.00
(28,659.84)	(29,220.17)	** Report Sub-Total **	0.00	(2,327.16)	0.00	(18,971.28)	0.00	0.00
		Expense						
		Direct Cost of Products & Services						
0.00	0.00	6418 Brochures	0.00	0.00	0.00	433.00	0.00	0.00
600.00	600.00	6425 On Line Hosting	0.00	0.00	0.00	0.00	0.00	0.00
600.00	600.00	**TOTAL Direct Cost of Products & Services**	0.00	0.00	0.00	433.00	0.00	0.00
		General Office - Controllable						

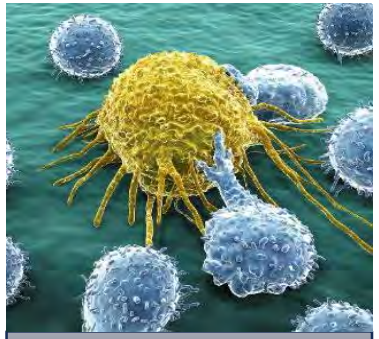
National Science Foundation: Engineering Update

Dawn Tilbury, Ph.D.
Assistant Director, NSF Directorate for Engineering

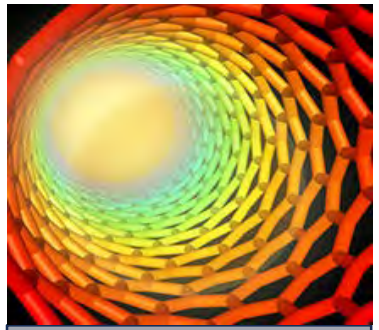
June 27, 2018

Investing in Engineering Research and Education and Fostering Innovations for Benefit to Society

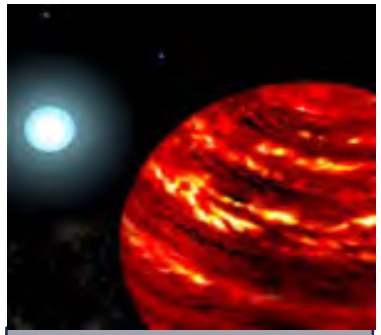
NSF Champions Research and Education across all Fields of Science and Engineering



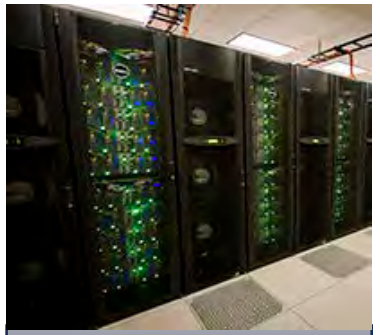
Biological Sciences



Engineering

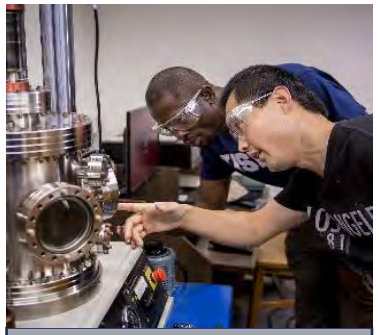


Mathematical & Physical Sciences



Computer & Info Sci & Eng

Geosciences (including Polar)



Integrative Activities

Education & Human Resources

Social, Behavioral & Economic Sci

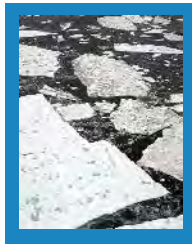
International Sci & Eng

NSF Big Ideas

RESEARCH IDEAS

Harnessing Data for 21st Century Science and Engineering

Work at the Human-Technology Frontier: Shaping the Future



Navigating the New Arctic

Windows on the Universe: Multi-messenger Astrophysics

Quantum Leap: Leading the Next Quantum Revolution

Understanding the Rules of Life: Predicting Phenotype

PROCESS IDEAS

Mid-scale Research Infrastructure

NSF 2026

Growing Convergence Research at NSF

NSF INCLUDES: Enhancing STEM through Diversity and Inclusion

" … bold questions that will drive NSF's long-term research agenda — questions that will ensure future generations continue to reap the benefits of fundamental S&E research. "

The Future of Work at the Human-Technology Frontier

"a unique opportunity to actively shape the development and use of technologies to improve the quality of work while also increasing productivity and economic growth"

Research Themes

- Building the human-technology partnership
- Augmenting human performance
- Illuminating the socio-technological landscape
- Fostering lifelong learning

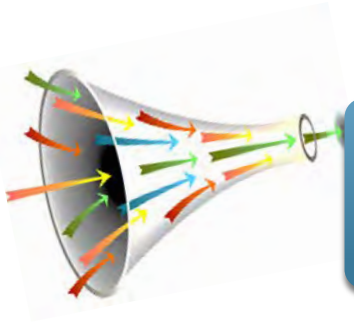
What Is a Convergence Accelerator?

- A new organizational structure intended to leverage external partnerships to accelerate convergent and translational activities in an area of national importance
- A home for application-driven basic research
- Advances ideas from concept to deliverables

Key Characteristics

- Fixed term
- Cohorts
- Seed investment
- Competition
- Intensive education
- Mentorship
- Intentional in outcomes
- Adopts convergent approach
- Partnerships
- Fed by basic research & discovery

Convergence Accelerator Phases



NSF PIs, partners, basic research results

0: Team Seeding

- Organic or through structured workshops
- Multi-disciplinary
- Diverse membership

1: Team Formation

- Cohorts of ~20 teams in 3-5 tracks
- ~6 months
- **Ideation**
- **Convergence**
- **Team dynamics**

Review

Pitch

2: Accelerated Research

- Large grants to selected teams
- Semi-annual or annual reviews
- Maintain cohort structure

Compete

Prize(s)

Unique NSF expertise, combined in new ways, designed to decrease time to discovery

Convergence Accelerators build on NSF innovations and best practices

- Network model: I-Corps (Teams and Cohorts)
- Collective Impact: NSF INCLUDES
- Team Development: Ideas Labs
- Industry-inspired Workshop on Quantum (Mar. 2018): Industry wants more similar workshops on HDR and FW-HTF topics (and URoL)

Convergence Accelerators add new dimensions

- Selection by pitch, instead of 15-page research proposal
- Competition for monetary prizes

QUESTIONS

Dawn Tilbury, Ph.D.
Assistant Director
National Science Foundation
Directorate for Engineering
Email: dmtilbur@nsf.gov
Office: 703-292-8300

Report on ACC 2018

Compiled by Carrie Hall (DSCD Rep. for the American Control Conference)

Meetings at ACC

Room and refreshment arrangements were made at ACC 2018 for the following DSCD meetings:

Meeting	Day and Time	Location
DSCD Executive Committee Meeting	Wednesday 1:30-5:30pm	MacArthur, Hilton
DSCD Division Meeting	Wednesday 7:30-11:30pm	Ballroom D, Wisconsin Center
Automotive & Transportation TC	Wednesday 6-7pm	Walker, Hilton
Mechatronics TC	Wednesday 6-7pm	Mitchell, Hilton
Vibrations TC	Wednesday 12-12:45pm	Kilbourn, Hilton
Energy Systems TC	Friday 12-1pm	Ballroom D, Wisconsin Center

Statistics for ACC 2018

There was a 67% acceptance rate for ACC submissions, but the acceptance rate for papers submitted through ASME was slightly higher at 70%. ASME also submitted 1 of the 7 tutorial sessions and 14 of the 48 invited sessions. Additional statistics are below.

Total number of paper submissions: 1623
Total number of accepted papers: 1087
Total number submitted through ASME: 148
Total number of accepted ASME papers: 104 (among which 3 were withdrawn)
Total number of Tutorial sessions submitted through ASME: 1 (out of total 7)
Total number if Invited sessions submitted through ASME: 14 (out of total 48)

IEEE/ASME International Conference on Advanced Intelligent Mechatronics

July 2018, Auckland, New Zealand

Prof. Shane Xie

Department of Mechanical Engineering,

The University of Auckland

Auckland, New Zealand

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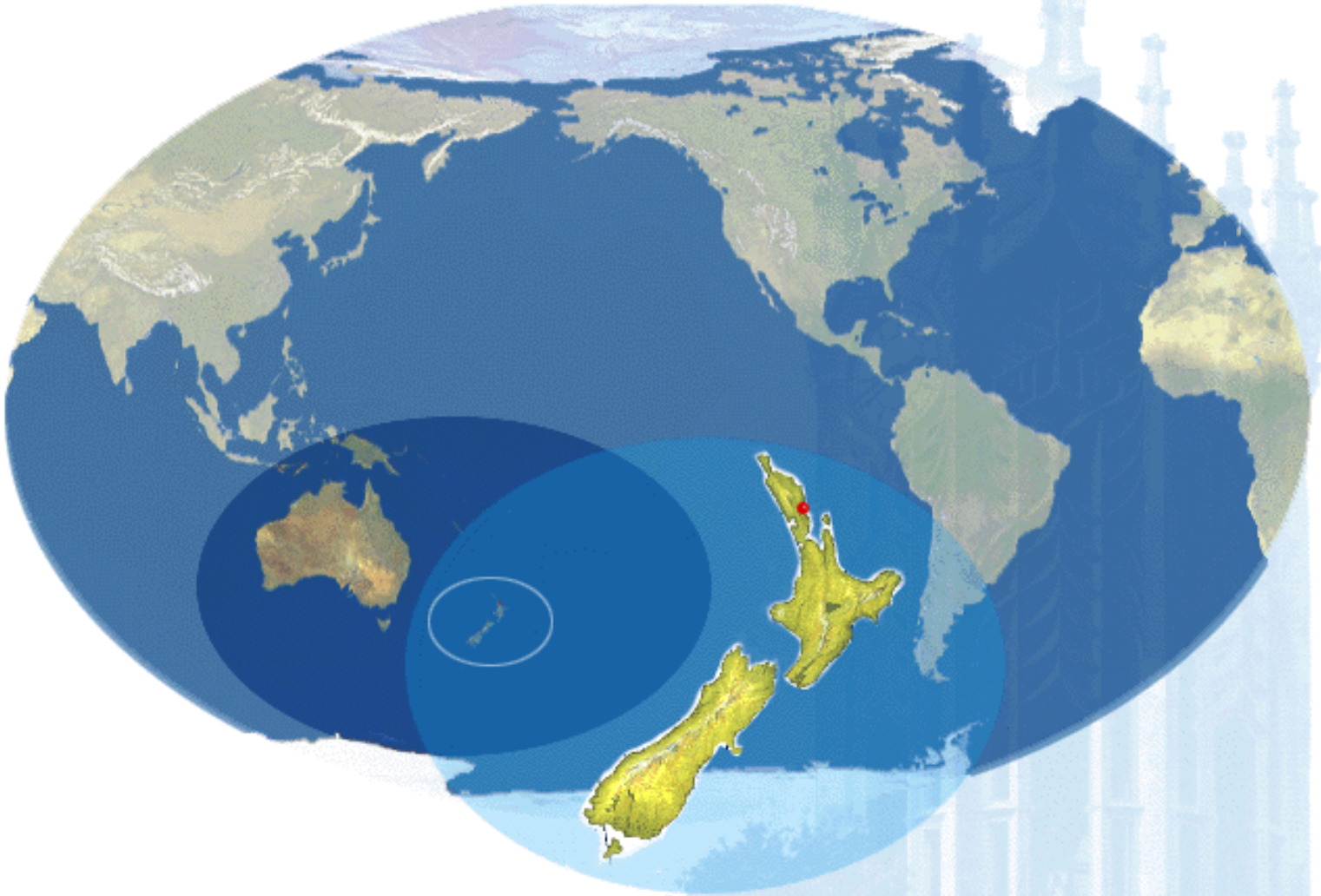
NEW ZEALAND
Te Whare Wānanga o Tāmaki Makaurau

THE UNIVERSITY OF AUCKLAND
NEW ZEALAND
Te Whare Wānanga o Tāmaki Makaurau

World Map and New Zealand



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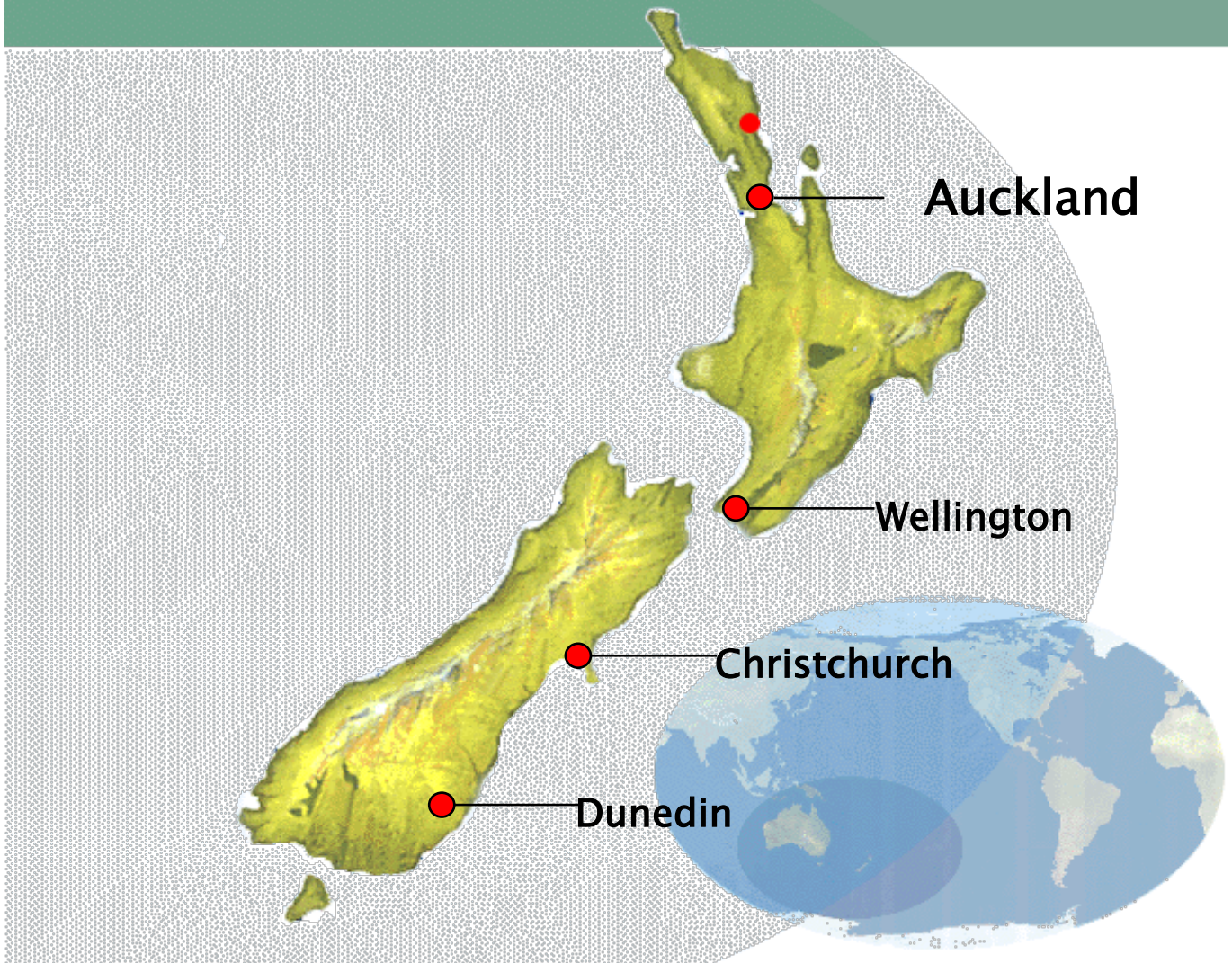
Te Whare Wānanga o Tāmaki Makaurau

New Zealand



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Te Whare Wānanga o Tāmaki Makaurau

Aerial View, City Campus

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Te Whare Wānanga o Tāmaki Makaurau

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Attractions

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Hoping to see you in *Auckland* in 2018

AIM is a flagship conference of IEEE/ASME Transactions on Mechatronics, for which ASME is a co-sponsor with the IEEE Industrial Electronics Society (IES) and the IEEE Robotics and Automation Society (RAS).

AIM2018

Hosted by Professors Sheng Q. Xie (University of Leeds, UK) and Kean Aw (University of Auckland, New Zealand), the 2018 IEEE International Conference on Advanced Intelligent Mechatronics (AIM 2018) will be held on July 9-12, 2018, Science Centre, University of Auckland, New Zealand. Detailed information can be found in the AIM2018 website: http://www.aim2018.org/. The technical program includes

Two workshops:

Workshop 1: A Biologically Inspired Tactile System for Robotics

Workshop 2: New Frontiers in Biomechatronics: From Brain Machine Interfaces to Assistive and Rehabilitation Robotics

Four keynotes:

Keynote 1: Smart mechatronics in medicine, J. Geoffrey Chase, Univ. of Canterbury, New Zealand.

Keynote 2: IonicPolymer-Metal Composites as a Candidate Underwater Active Material, Kwang J. Kim, Univ. of Nevada, USA.

Keynote 3: Modelling, Verification, Control and Co-Design of a Wave Energy Converter, Ron J Patton, Univ. of Hull, UK.

Keynote 4: Cloud Robotics: The Cloud-Side Story- Low-Latency and Reliable Cloud Computing for Robotics, Jie Xu, Univ. of Leeds, UK.

48 parallel sessions and a Poster session

Program Statistics:

310 registered to attend the conference.

324 papers submitted.

- 245 papers accepted for conference and to be published in Xplore
    - 207 contributed
    - 38 invited
- 9 papers accepted as poster but not to be published in Xplore.

Total of papers from 40 countries.

2019 IEEE/ASME International Conference on Advanced Intelligent Mechatronics

Date: July 8 – 12, 2019
Venue: Hong Kong Science Park, Hong Kong

Prepared by:
Dong Sun, General Chair
Hesheng Wang, Program Chair

Conference Date

- July 8 – 12, 2019

JULY						
SUN	MON	TUE	WED	THU	FRI	SAT
	1	2	3	4	5	6
7	8	9	10	11	12	13
14	15	16	17	18	19	20
21	22	23	24	25	26	27
28	29	30	31			

Hong Kong – Premier Convention & Exhibition Centre

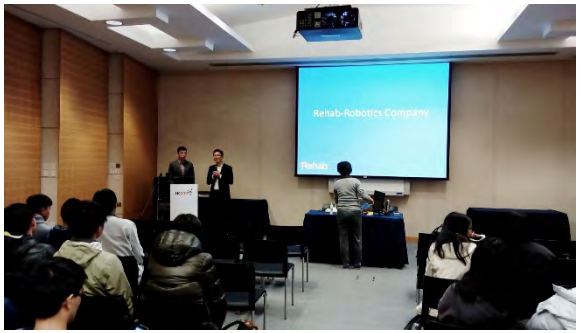
- Strategic Location
  - The heart of enterprising Asia
  - Visa-free travel for visitors from over 170 countries and territories
  - Around 1,100 daily flights from over 220 worldwide destinations
  - Comprehensive international transport
- Developed and reliable infrastructure
- Friendly and safest city

Conference Venue

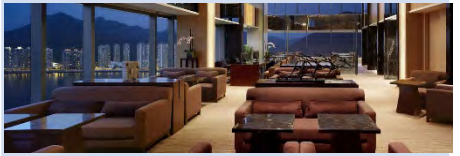
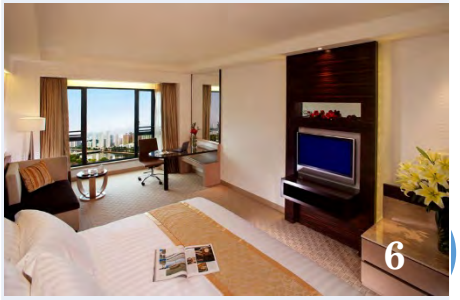
- **Hong Kong Science Park, Sha Tin, Hong Kong**
- Opening Ceremony & Plenary Talks: Charles K. Kao Auditorium with seats up to 288

Conference Venue

- Workshops and Technical Sessions: 6 rooms with 30 – 60 seats/room at Convention Centre 2



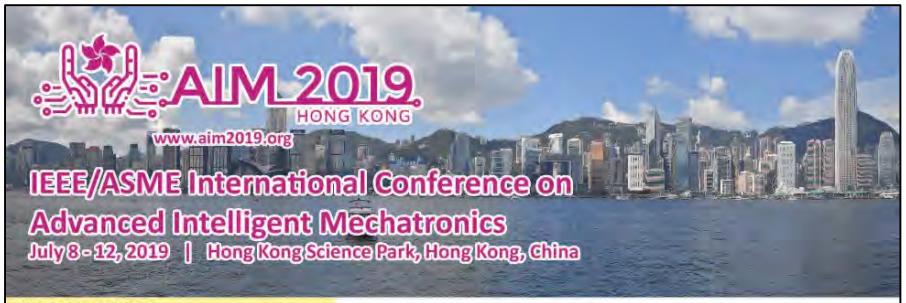
Accommodation

Hotel	Distance to Science Park by Car	Hotel Class	No. of Rooms	$ (USD)	
Hyatt Regency Hong Kong, Sha Tin 	5 minutes	★★★★★	559	145 + 10% tax (including breakfast and internet access)	 
Royal Park Hotel, Sha Tin 	15 minutes	★★★★	443	130 + 10% tax (including breakfast and internet access)	

AIM 2019 Website

www.aim2019.org

Call for Papers of AIM 2019



Honorary Advisory Committee
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Tzyh-Jong Tarn, Washington University, USA
Masayoshi Tomizuka, UC Berkeley, USA
Toshio Fukuda, Nagoya/Meijo University, Japan; BIT, China
Ren C. Luo, National Taiwan University, Taiwan
Kok-Meng Lee, Georgia Institute of Technology, USA
Okyay Kaynak, Bogazici University, Turkey
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Lin Wang, Shanghai Jiao Tong University, China
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Information Technology
Jia Pan, City University of Hong Kong, China
Conference Secretary
Miranda Chi, City University of Hong Kong, China

Call for Papers

The 2019 IEEE/ASME International Conference on Advanced Intelligent Mechatronics (AIM 2019) will be held on July 8 -12, 2019 in Hong Kong Science Park, Hong Kong, China. As a flagship conference focusing on mechatronics and intelligent systems, the AIM 2019 will bring together an international community of experts to discuss the state-of-the-art, new research results, perspectives of future developments, and innovative applications relevant to mechatronics, robotics, automation, industrial electronics, and related areas.

The sponsors and organizers of AIM 2019 invite a submission of high quality mechatronics research papers describing original work, including but not limited to the following topics: Actuators, Automotive Systems, Bioengineering, Data Storage Systems, Electronic Packaging, Fault Diagnosis, Human-Machine Interfaces, Industry Applications, Information Technology, Intelligent Systems, Machine Vision, Manufacturing, Micro-Electro-Mechanical Systems, Micro/Nano Technology, Modeling and Design, System Identification and Adaptive Control, Motion Control, Vibration and Noise Control, Neural and Fuzzy Control, Opto-Electronic Systems, Optomechatronics, Prototyping, Real-Time and Hardware-in-the-Loop Simulation, Robotics, Sensors, System Integration, Transportation Systems, Smart Materials and Structures, Energy Harvesting, and other frontier fields.

All contributed and invited papers, tutorial and workshop proposals, and invited and special session proposals must be uploaded through the submission website (www.aim2019.org) according to the deadlines below.

Contributed & Invited Papers: All papers go through a rigorous review process. Accepted papers will be presented by their authors at the conference. All accepted peer-reviewed manuscripts will be published in the conference proceedings, and will be submitted for inclusion in IEEEXplore, subject to formatting and copyright requirements.
Tutorials & Workshops: Proposals are invited for half-day or full-day tutorials and workshops. Workshops explore the frontiers of recent or emerging topics in mechatronics, while tutorials provide a foundation for future self-study in important area of mechatronics. Tutorial and workshop proposals must include: (1) a statement of objectives, (2) a description of the intended audience, and (3) a list of speakers with an outline of their planned presentations. Unless specifically requested, individual tutorial and workshop presentations are not peer reviewed, and do not appear in the proceedings.
Invited & Special Sessions: Proposals are invited for invited and special sessions. Invited sessions consist of 4 to 6 thematically related invited papers. Invited session proposals consist of a brief statement of purpose and extended abstracts of the included invited papers. Invited papers are submitted and reviewed following the same process as contributed papers, and are included in the proceedings.

Important Dates

Submission of Special & Invited Session Proposals	February 10, 2019
Submission of Tutorial & Workshop Proposals	February 10, 2019
Submission of Contributed & Invited Papers	February 28, 2019
Notification of Paper Status	April 25, 2019
Final Paper Submission	May 15, 2019
Advanced Registration	May 28, 2019

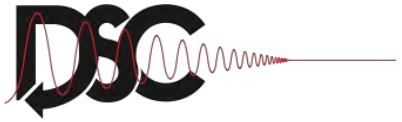
**All deadlines are 23:59 PST.*

Daily Program

Date	Program
July 8 (Mon)	Workshops
July 9 (Tue)	Opening Ceremony Plenary Talks Technical Sessions Welcome Reception
July 10 (Wed)	Plenary Talks Technical Sessions Poster Session Banquet
July 11 (Thu)	Plenary Talks Technical Sessions Farewell Party
July 12 (Fri)	Technical Tours

Organizations

- Co-Sponsors



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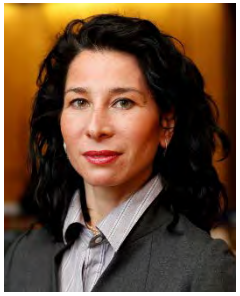

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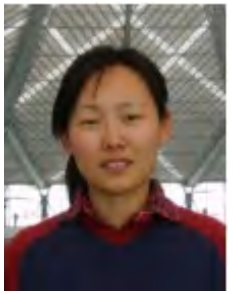

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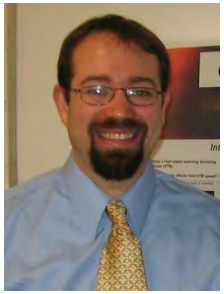

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Dikai Liu
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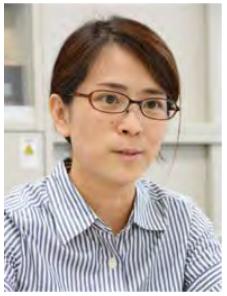

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Zhenhua Xiong
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China

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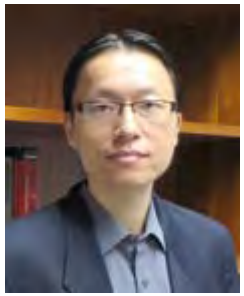
Chiba University of Technology, Japan

Pakpong Chirarattananon
City University of Hong Kong, China

Industry Committee Chair:

Haoyao Chen
Harbin Institute of Technology, China

Registration Chair:



Henry K. Chu
The Hong Kong Polytechnic University, China

Local Arrangement Chair:

Yajing Shen
City University of Hong Kong,
China

Information Technology:

Jia Pan
City University of Hong Kong,
China

Conference Secretary:

Miranda Chi
City University of Hong Kong,
China

Budget Summary

SUMMARY	
Total Conference Revenue	US$239,400
Total Conference Outlays	US$199,420
Surplus	US$39,980
Percentage of Surplus	20.05% of Expense

AIM 2019
HONG KONG

JULY 8 – 12, 2019

WE LOOK FORWARD TO SEEING YOU IN HONG KONG IN 2019!

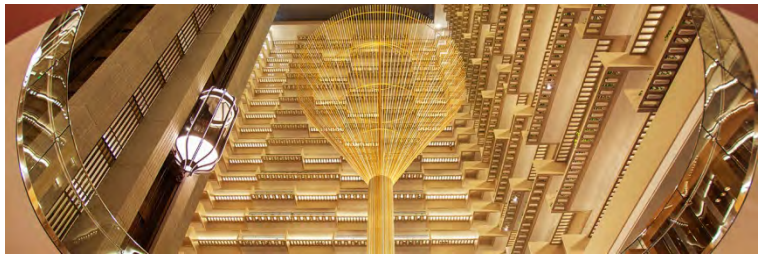
2018 ASME Dynamic Systems and Control Conference (DSCC)

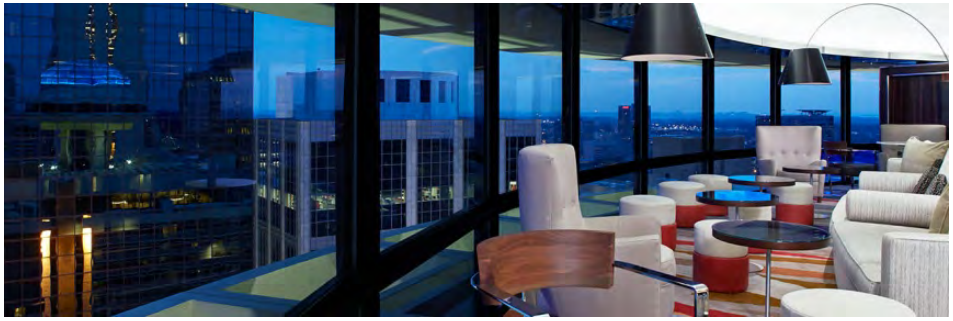
September 30 – October 3, 2018
Atlanta, Georgia

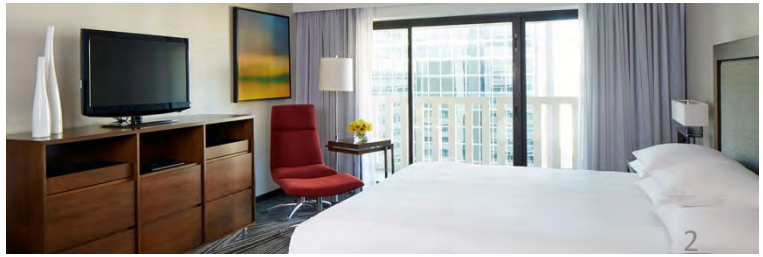
Venue

Hotel: Hyatt Regency, Atlanta

- Guest room rate $179
- Convenient downtown location, 12 miles from the airport, connected directly to MARTA
- Blocks away from Georgia Aquarium, the World of Coco-Cola and other attractions; 1.5 miles from Georgia Tech







Paper Submissions and Acceptance

- 291 draft papers submitted, including 12 invited sessions
- 245 papers accepted (notifications sent early week of June 4)
- Acceptance rate: 84.19%. Very comparable to 2017 DSCC acceptance rate (257 out of 305, 84.26%).
- Expect to form 42 sessions (6 parallel sessions, 7 two-hour slots)

Workshops

- To be held on the afternoon of September 30 (Sunday)
- Five proposals received and accepted
  1. From data to models and decisions in engineering systems
  2. Enhancing energetic performance for mobile and wearable robotic systems
  3. Connected and automated vehicles
  4. The future of mechatronics and robotics education
  5. Autonomous control for rotorcraft operation

Plenary Talks

- October 1, 2018 (morning): Nyquist Lecturer: Huei Peng (University of Michigan)

- October 2, 2018 (morning): Marcia O'Malley (Rice University)

- October 2, 2018 (evening): Oldenburger Medalist: Roberto Horowitz (University of California, Berkeley)

- October 3, 2018 (morning): Magus Egerstedt (Georgia Tech)

Special Events/Sessions

- Best Student Paper Award competition: 20 nominations received.
  - A committee was formed to conduct evaluation. Finalists to be announced in July.
  - Special session (6-7pm on October 1) for final competition
- Student Networking Event (Academia) (12-1pm on October 2)
  - Five faculty mentors recruited
- Student Networking Event (Industry) (12-1pm on October 2)
  - At least one industrial mentor identified; more to be recruited after the program is available; effort also underway by Ueda to recruit from local companies
- Early Academic Career Panel (12-12:45pm on October 1)
  - About 5 NSF CAREER panelists identified
- Georgia Tech Tour (1-5pm on October 3)
- Funding panel (Time/panelists TBD)

Sponsorships

- Quanser (Bronze)
- University of Utah (Bronze)
- Michigan State University (Bronze)
- Georgia Tech (sponsoring shuttle bus for GT tour)
- A journal from China (Bronze)
- Ueda and Kam still working to recruit local companies from Atlanta

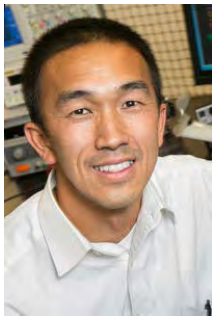
Registration

- Final paper submission due July 2. At least one author needs to have full registration for paper upload.
- Advance member registration (by August 20): $555; advance student member registration $255.
- Workshop registration $75. Should the workshop TEC proposal get funded, student workshop registration will be free and $25 for others.

Organizing Committee

General Chair
Xiaobo Tan

Program Chair
George Zhu



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Invited Sessions Chair, **Juan Ren**

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Students Chair
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Publications Chair
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2018 DSCC

The ASME 2018 Dynamic Systems and Control Conference

(https://www.asme.org/events/dscc)

October 1-3, 2018, Hyatt Regency Atlanta, Atlanta, Georgia, USA

Conference Organizers

General Chair
XIAOBO TAN, *xbtan@egr.msu.edu*
Michigan State University

Program Chair
GEORGE ZHU, *zhug@egr.msu.edu*
Michigan State University

Exhibits and Industrial Liasion Chair
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Workshops and Tutorials Chair
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Publications Chair
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Publicity Chair
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Conference Editorial Board Chair
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North Carolina State University

ASME Program Manager
ERIN DOLAN, *dolane@asme.org*
ASME

Conference Toolbox Coordinator
toolboxhelp@asme.org

The 2018 Dynamic Systems and Control (DSC) Confernece will be held on October 1-3, 2018 at the Hyatt Regency Atlanta, located in the heart of downtown Atlanta, Georgia. The venue is one of the top Atlanta luxury hotels and is connected to the MARTA transit system and blocks away from major attractions such as Georgia Aquarium and the World of Coca-Cola. On behalf of the 2018 DSCC Organization Committee and the Dynamics Systems and Control Division (DSCD) of ASME, we cordinally invite you to enjoy an exciting technical program and a unique opportunity to network.

The DSC conference is the showcase technical forum of the ASME Dynamic Systems and Control Division. It provides a focused and intimate setting for dissemination and discussion of the state of the art in dynamic systems and control research, with a mechanical engineering focus. The 2018 DSC Conference Technical Program will consist of sessions in all of the usual areas of interest to the Division that include, but are not limited to, automotive and transportation systems, bio-systems and health care, energy systems, mechatronics, modeling, identification, intelligent systems, robotics, vibrations, and smart structures. Highlights of the 2018 DSCC will include:

- Four plenary talks given by distinguished scholars, including the Oldenburger Lecture and the Nyquist Lecture.
- Workshops and tutorials that are focused on emerging topics.
- Invited and special sessions on technical tracks and funding programs that are of interest to the DSC community.
- Student programs including Best Student Paper competition, networking with faculty recruiters, and networking with industry.
- Exhibits by industry.
- Extensive networking opportunities during the opening reception, continental breakfasts, the banquet, and the farewell lunch.

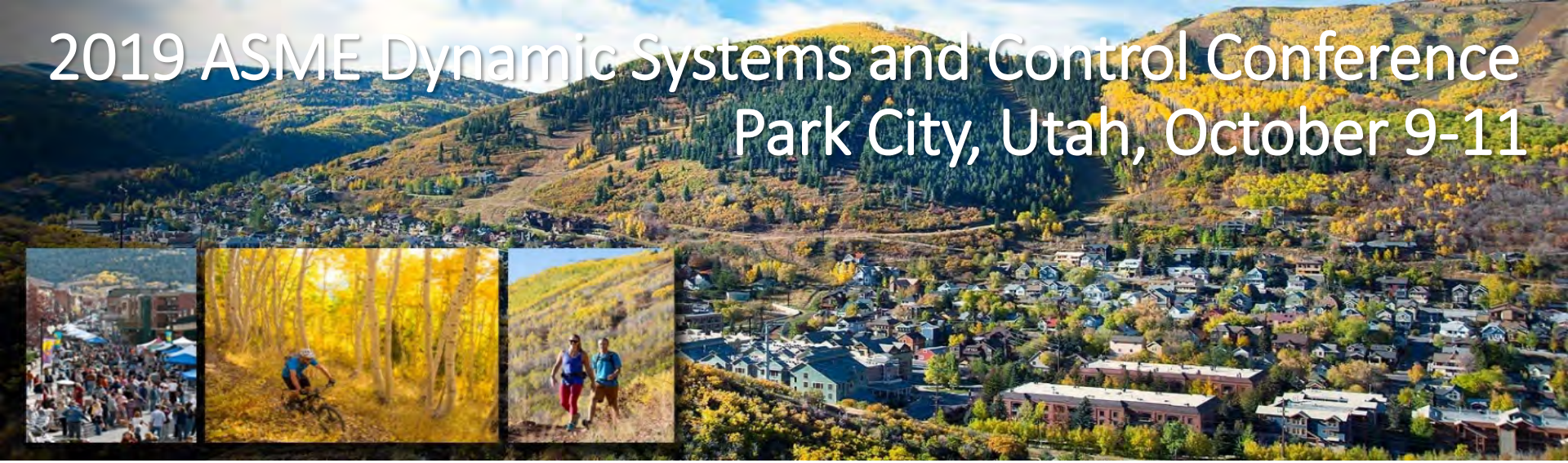
All accepted papers must be presented on-site at the conference by an author of the paper. Papers which are not presented (no-shows) will be removed from the official conference proceedings and will not be indexed through the ASME Digital Collection.

Online access to conference papers will be given to all registered attendees at the start of the conference. Following the event, the official proceedings of the conference are published in the ASME Digital Collection, and will be submitted to all major indexers including EI Complex, Scopus, and the ISI Conference Proceedings Citation Index.

ASME
SETTING THE STANDARD

Important Dates

- Submission of invited session proposals - **April 2, 2018**
- Submission of contributed and invited papers - **April 9, 2018**
- Notification of acceptance/rejection - **May 28, 2018**
- Submission of final papers - **July 9, 2018**



ASME Dynamic Systems and Control Conference 2019 Updates

Kam K. Leang (General Chair), University of Utah

Garrett Clayton (Program Chair), Villanova University

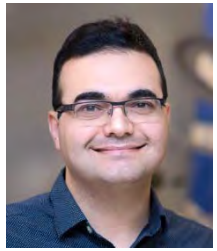
Conference Organizers

General Chair
Kam K. Leang
University of Utah

Program Chair
Garrett Clayton
Villanova University

Local Arrangements Chair
Steve Mascaro
University of Utah

Publicity Chair
Zheng Chen
University of Houston



Publications Chair
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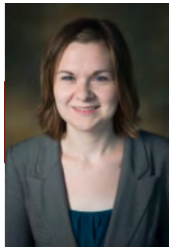
Memorial Univ. of Newfoundland

Workshops & Tutorials Chair
Reza Moheimani
UT Dallas



Invited/Special Sessions Chair
Carrie Hall
Illinois Institute of Technology - Chicago

Students and Young Members Chairs
Matteo Aureli and Nicole Abaid
Univ. of Nevada, Reno and Virginia Tech

Conf. Editorial Board Chair
Fen Wu
North Carolina State University

ASME Program Manager
Exhibits and Industry Liaison
Edmond Valpoort

ASME
Conf. Coordinator
Stacey Cooper


Downtown Park City
Park City: a world-class mountain resort town
Hiking
Public transportation is free in Park City
Balloon rides
Mountain biking
University of Utah campus tour
Alf Engen Ski Museum
Olympic Museum, ski jump, bobsled, etc., training facilities

Venue: Grant Summit Hotel, Park City, Utah

Venue: Lodging rates

Park City - Mechanical Dept. Engineering						
Run of Village	Mon 10/7/2019	Tue 10/8/2019	Wed 10/92019	Thu 10/10/2019	Fri 10/11/2019	Sat 10/12/2019
Hotel Guestrooms	5	135	165	160	45	c/o

Total Room Block = 510 room nights

GUEST LODGING RATES

The following (**Commissionable**) room rates will be in effect during the Event. All rates quoted are based on single or double occupancy:

GRAND SUMMIT HOTEL
Standard Hotel Guestroom $139.00
*One Bedroom Residence/Suite $189.00

SUNDIAL LODGE
Standard Hotel Guestroom $129.00
*One Bedroom Residence/Suite $179.00

SILVERADO LODGE
Standard Hotel Guestroom $109.00
*One Bedroom Residence/Suite $169.00

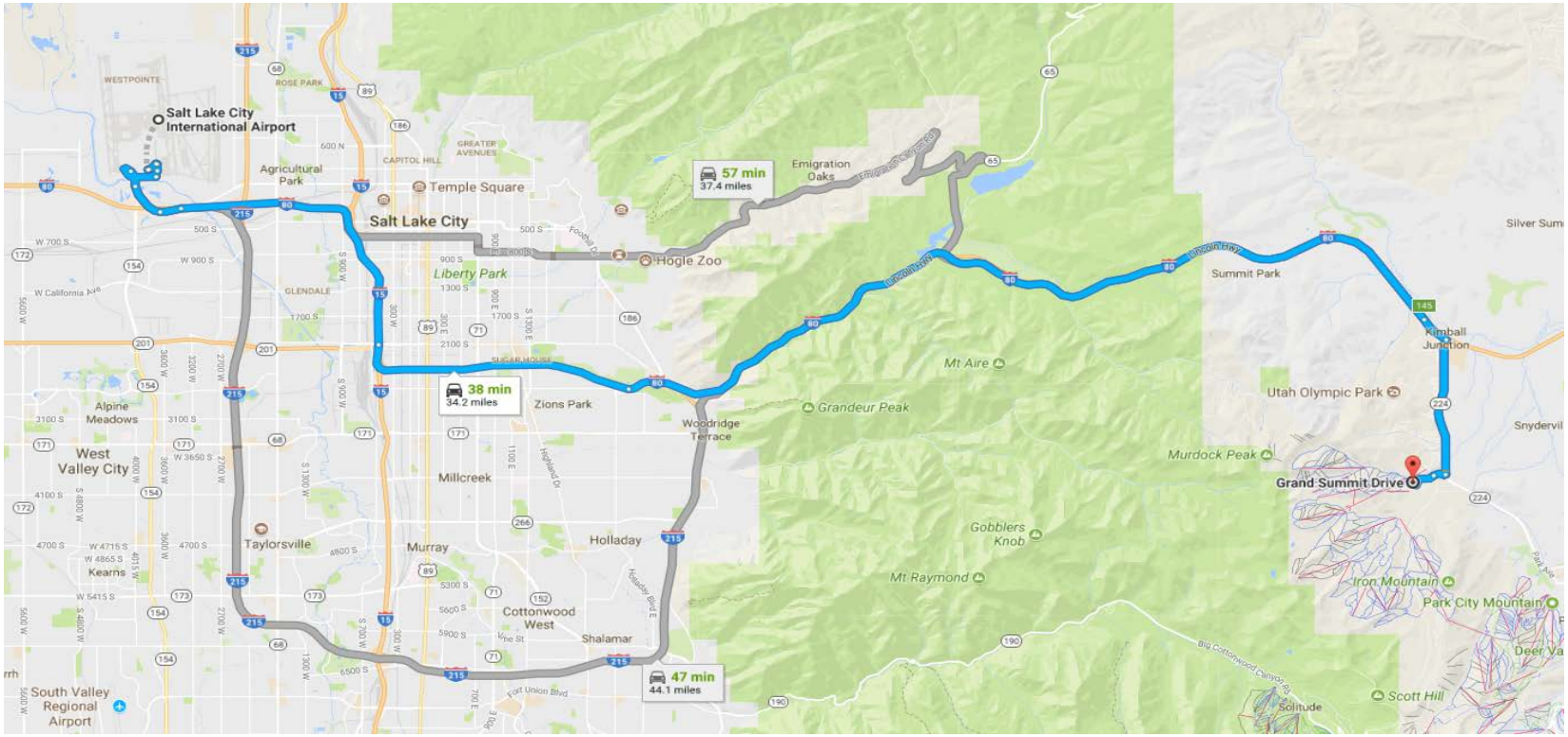
Venue: Additional hotels nearby

Within a short walking distance of the Grand Summit are additional hotels including:

Westgate at Canyons	Hyatt Centric	Sundial and Silverado
		
		
		

Travel info

- Major airport: Salt Lake City (SLC) International Airport
- SLC airport to Park City: ~35 minutes
- Uber/Lyft cost: $30-45



2019 DSCC

The ASME 2019 Dynamic Systems and Control Conference

(https://www.asme.org/events/dscc)

October 9-11, 2019, Grand Summit Park City, Utah (USA)

Conference Organizers

General Chair
Kam K. Leang, *kam.k.leang@utah.edu*
University of Utah

Program Chair
Garrett Clayton, *garrett.clayton@villanova.edu*
Villanova University

Local Arrangements Chair
Steve Mascaro, *jsmascaro@mech.utah.edu*
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Invited and Special Session Chair
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Workshops and Tutorials Chair
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UT Dallas

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Nicole Abaid, *nabaid@vt.edu*
Virginia Tech

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University of Houston

Conference Editorial Board Chair
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North Carolina State University

ASME Program Manager and Exhibits/ Industrial Liaison Chair
Edmond Valpoort, *ValpoortE@asme.org*
ASME

Conference Toolbox Coordinator **Stacey Cooper**, *toolboxhelp@asme.org* **ASME**

The 2019 Dynamic Systems and Control (DSC) Conference will be held on October 9-11, 2019 at the Grand Summit Hotel in Park City, Utah. Park City is a world-class resort town, famous for hosting the Sundance Film Festival and the 2002 Winter Olympics. October is a nice time to visit Park City because it is considered a shoulder season, with temperatures similar to those in the spring and the venue offers very competitive room rates. On behalf of the 2019 DSCC Organization Committee and the Dynamics Systems and Control Division (DSCD) of ASME, we cordinally invite you to enjoy an exciting technical program and a unique opportunity to network.

The DSC conference is the showcase technical forum of the ASME Dynamic Systems and Control Division. It provides a focused and intimate setting for dissemination and discussion of the state of the art in dynamic systems and control research, with a mechanical engineering focus. The 2019 DSC Conference Technical Program will consist of sessions in all of the usual areas of interest to the Division that include, but are not limited to, automotive and transportation systems, bio-systems and health care, energy systems, mechatronics, modeling, identification, intelligent systems, robotics, vibrations, and smart structures. Highlights of the 2019 DSCC will include:

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- Workshops and tutorials that are focused on emerging topics.

- Invited and special sessions on technical tracks and funding programs that are of interest to the DSC community.

- Student programs including Best Student Paper competition, networking with faculty recruiters, and networking with industry.

- Exhibits by industry and academia.

- Extensive networking opportunities during the opening reception, continental breakfasts, the banquet, and the farewell lunch.

All accepted papers must be presented on-site at the conference by an author of the paper. Papers which are not presented (no-shows) will be removed from the official conference proceedings and will not be indexed through the ASME Digital Collection.

Online access to conference papers will be given to all registered attendees at the start of the conference. Following the event, the official proceedings of the conference are published in the ASME Digital Collection, and will be submitted to all major indexers including EI Complex, Scopus, and the ISI Conference Proceedings Citation Index.

ASME
SETTING THE STANDARD

Important Dates (Tentative)

- Submission of contributed and invited papers - **April 1, 2019**
- Notification of acceptance/rejection - **May 27, 2019**
- Submission of final papers - **July 1, 2019**

Organizing the DSCC

Presentation at ACC 2018

DSCC

The DSC conference is the showcase technical forum of the ASME Dynamic Systems and Control Division. It provides a focused and intimate setting for dissemination and discussion of the state of the art in dynamic systems and control research, with a mechanical engineering focus.

- mid-sized (roughly 300-400 attendees,~300 papers)
- affordable for and friendly to student attendees
- promote and enable networking
- awards venue for DSCD

DSCC Organizing Committee

DSCD ExComm approves

- The General Chair (GC) for the DSCC
- The Program Chair (PC)
- Dates
- Venue of the DSC Conferences.
- Overall Budget and Major Contracts

The GC and PC choose their own organizing committee

DSCC Steering Committee (SC)

DSCC SC: Makes recommendations to ExComm

- The dates and places of the conferences for the subsequent years
- Candidates for General and Program Chairs
- General policies on program composition, financial goals, and promotional practices.
- Fees and budget for each conference.

DSCC Steering Committee (SC)

- Past Chair of the ASME DSCD ExComm --- serves as chair of the the DSCC Steering Committee
- DSCC General Chairs (most-recent-past, current, and all
- DSCC Program Chairs (most-recent-past, current, and all future).

- The ASME conference representative will be invited to attend the DSCC Steering Committee meetings
- The DSCC Steering Committee shall meet at least once a year, and present its recommendations at the DSCD ExComm at the DSCC

2020 DSCC Proposal

- Proposal to host in **Hartford, Connecticut, October 2020**

2020 DSCC GC and PC

- General Chair: *Jiong Tang* (jiong.tang@uconn.edu) Professor, Department of Mechanical Engineering, University of Connecticut
  Past involvement with DSCC
  DSCC 2016, Program Chair
  DSCC 2013, Publication Chair
  DSCC 2012 – present, Session Co-Organizer of Vibration Control
  Involvement with other conferences
  ISFA 2018, Program Co-Chair
  ASME IDETC 2019, General Co-Chair
  Symposia/session organizers for ASME IDETC, ASME SMASIS, SPIE Smart Structures, etc.

2020 DSCC GC and PC

- Program Chair: *Qingze Zou* (qzzou@rci.rutgers.edu)
  Professor, Department of Mechanical & Aerospace Engineering, Rutgers University

- Past involvement with DSCC
  DSCC 2014, Students and Young Members Chair
  DSCC 2016, 2017, Program Committee Member
  DSCC 2008, Invited Session Organizer

Future DSCC proposals

- The DSCC Steering Committee Chair, in consultation with the Steering Committee,
- will develop a list of potential candidates for the General Chair (GC), and Program Chair (PC) positions,
- and solicit proposals for the conference.
- This can include a broad mailing to the community as well as direct solicitations from potential GCs.

Typical Issus

- DSCCs are typically held Mon.-Wed. or Wed.-Fri. in mid-to-late October
- Ease of accessibility
- Near major airline hub
- Near industry or large university (Industry and Laboratory tours)
- Availability of potential hotels with reasonable room rates
- Meeting rooms should include
- Multiple (7 or more) parallel sessions, each with 60 seat capacity
- Ballroom (300 attendees) for keynote plenary and awards banquet
- Boardrooms (3 or more), each with a capacity of 25 for meetings that may be held in parallel
- Industrial participation potential (exhibition space)

Future DSCC Organization

- If interested in organizing a futureDSCC, please discuss with Peter Meckl.
- Proposals are due (ideally, a month before the next DSCC)

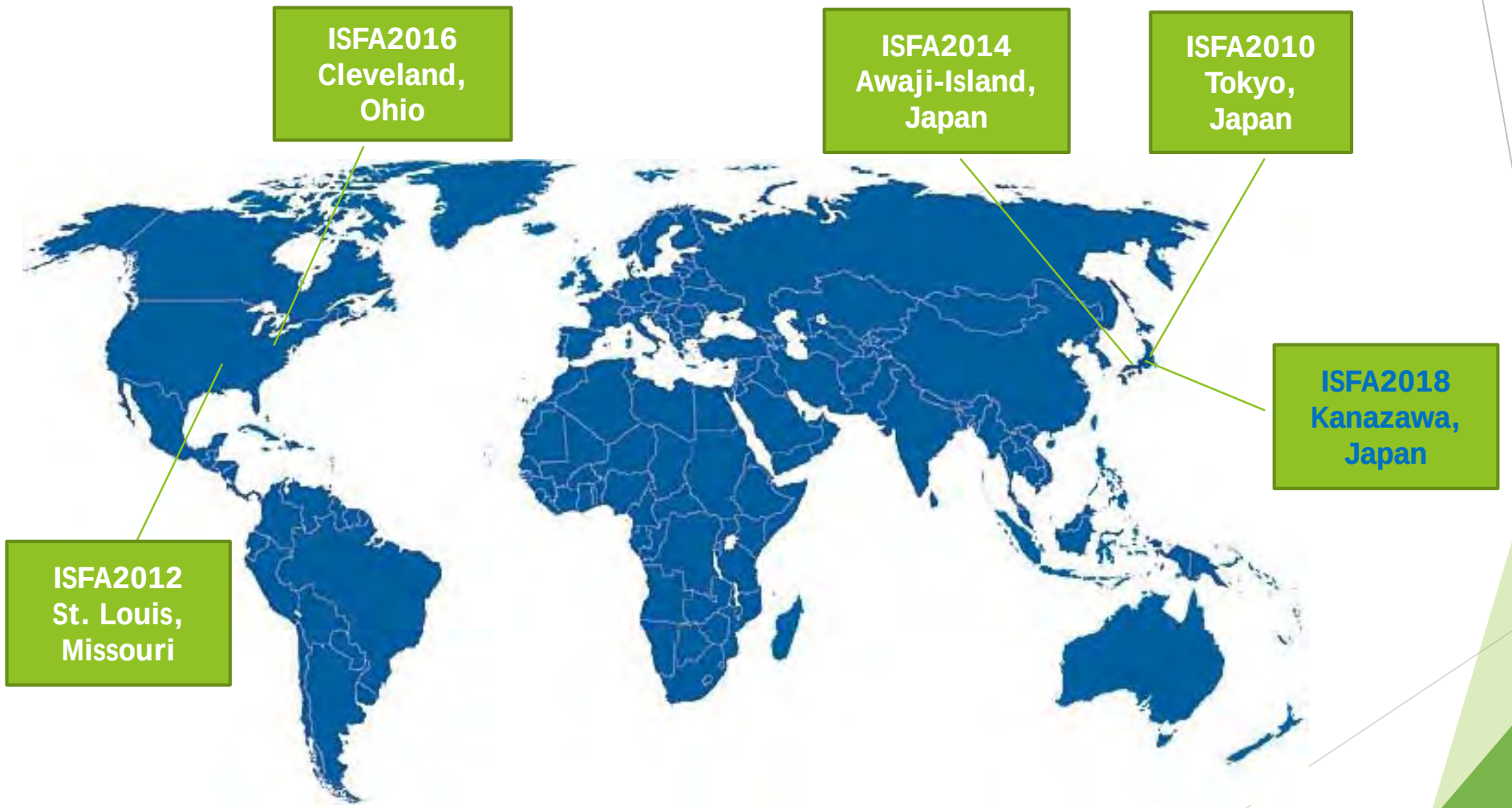
What is in a DSCC proposal

a. **Conference venue** (identify potential city or cities).
b. Venue: At this point a hotel selection is not needed, but clarity that such hotels (able to accommodate a 300-400 attendee meeting) are available in the host city would be helpful.
c. Venue: Highlights about the city (such as ease of accessibility by being close to a major airline hub),
d. Venue: Potential activities such as site visits to labs in a major university or industries could be added.
e. **A one-page summary (each) of the background of the GC, and the PC.** This should include past activities in ASME DSCD, as well experience with conference activities (both ASME and non-ASME).

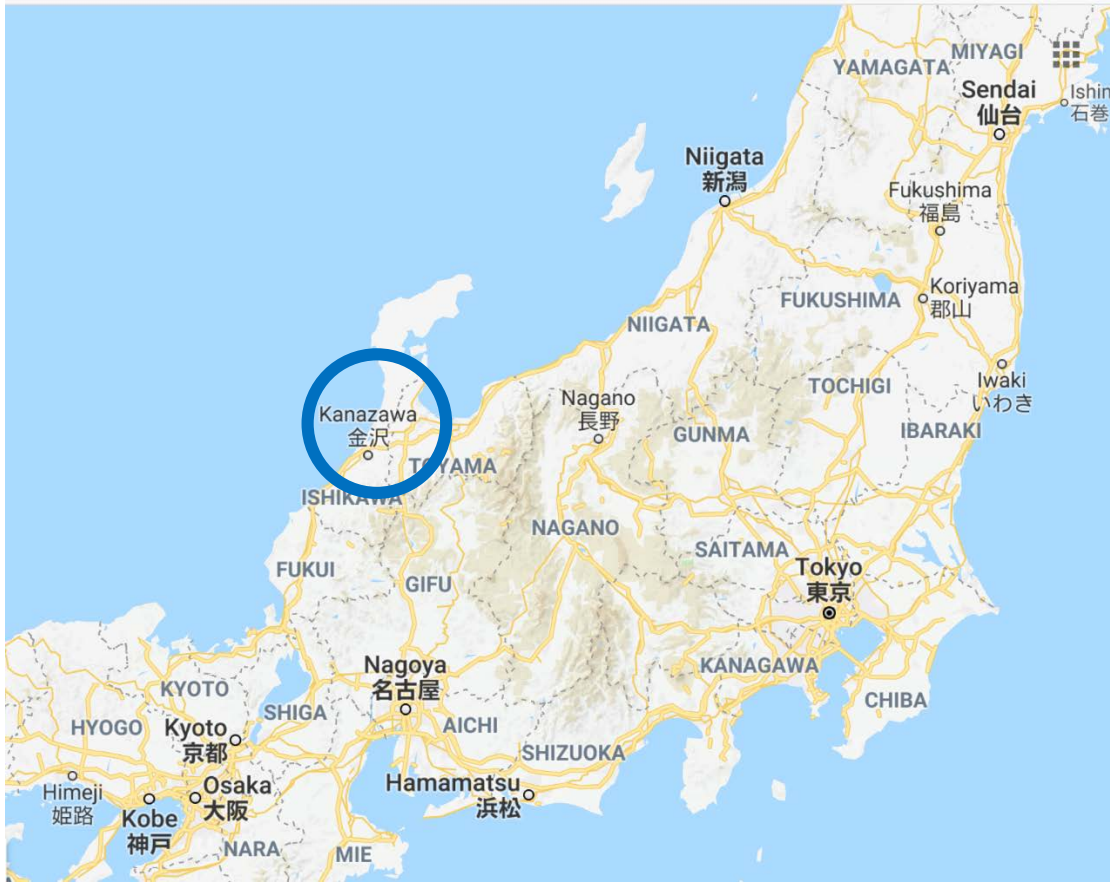
2018 International Symposium on Flexible Automation

July 15-19, 2018
Kanazawa, Japan

Conference History: Recent Eight Years



Conference Location



How to Get To Kanazawa

By Train from Tokyo
JR Tokyo Station
⇔ JR Kanazawa Station (2 hr., 28 min. via Hokuriku Shinkansen)

By Air from Domestic Airports
1. Haneda ⇔ Komatsu Airport (1 hr., 10 min.)
2. Narita ⇔ Komatsu Airport (1 hr., 15 min.)
Bus from Komatsu Airport to Kanazawa Korinbo (55 min.)

Committee Chairs

Advisory Committee

Tohru Watanabe, Ritsumeikan University, Japan

Masayoshi Tomizuka, University of California at Berkeley, USA

Organizing Committee

Eiji Arai, Osaka University, Japan

Jian Cao, Northwestern University, USA

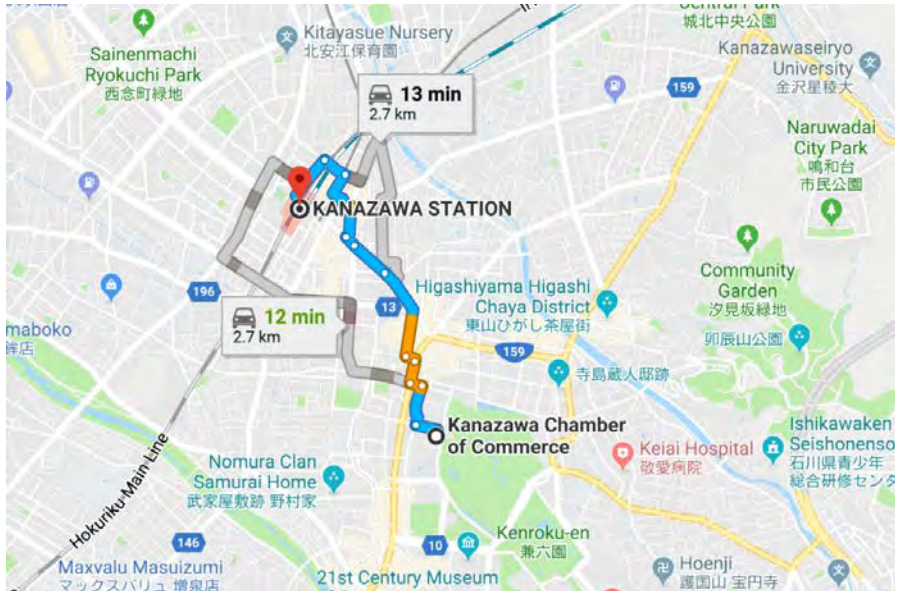
Program Committee

Keiichi Shirase, Kobe University, Japan

Jiong Tang, University of Connecticut, USA

Conference Venue

Venue: Kanazawa Chamber of Commerce and Industry
Address: 9-13 Oyamamachi, Kanazawa, Ishikawa Prefecture 920-0918



Conference-at-a-Glance

Sunday, July 15
17:00 -- 18:00 Reception open
18:00 - 19:30 Welcome Party

Monday, July 16				
9:30 -- 9:50	Opening adress			
9:50 -- 10:50	Plenary Speech1; Dr. Masahiko Mori, President, DMG MORI CO., LTD. "Future of Machine Tools and Manufacturing" (tentative)			
10:50 -- 11:00	Breake			
11:00 -- 12:00	Plenary Speech2; Dr. Yoshihiro Suda, Professor, The University of Tokyo "Automated Driving Systems" (tentative)			
12:00 -- 13:00	Lunch			
13:00 -- 14:20	OS14-1 (4)	OS1-1 (4)	OS8-1 (4)	OS4 -1(4)
14:20 -- 14:40	Breake			
14:40 -- 16:00	OS14-2 (3)	OS1-2 (3)	OS10-1 (4)	OS4-2 (4)

Wednesday, July 18				
9:00 -- 10:00	Plenary Speech 4; Dr. Fumihiko Kimura, Professor Emeritus, The University of Tokyo "IT Support for Product and Process Development" (tentative)			
10:00 -- 10:20	Breake			
10:20 -- 12:00	OS3-2 (5)		OS5-1 (5)	OS6-1 (4)
12:00 -- 13:00	Lunch			
13:00 -- 14:40	OS3-3 (4)			OS6-2 (4)
14:40 -- 15:00	Breake			
15:00 -- 16:00	Closing Ceremony			

Tuseday, July 17				
9:00 -- 10:00	Plenary Speech 3; Dr. Wei Chen, Professor, Northwestern University "Multi-scale and Multi -dimensional Quantification and Propagation of Manufacturing Induced Uncertainty"			
10:00 -- 10:20	Breake			
10:20 -- 12:00	OS3-1 (5)	OS2-1 (5)	OS12-1 (4)	OS11-1 (5)
12:00 -- 13:00	Lunch			
13:00 -- 14:20	OS13-1 (3)	OS2-2 (3)	OS12-2 (4)	OS11-2 (4)
14:20 -- 14:40	Breake			
14:40 -- 16:20	OS7-1 (2)	OS2-3 (5)	OS12-3 (3)	OS11-3 (3)
16:20 -- 18:00	Breake			
18:00 -- 20:00	Banquet			

Thurdsday, July 19
9:00 -- 14:30 Technical Tours

Technical Program

Technical Papers

Finalized:

- **100 papers**
- **4 parallel sessions**

Keynote Speeches/Plenary Sessions

- **Masahiko Mori,** President, DMG MORI CO., LTD.
  - Future of Machine Tools and Manufacturing
- **Yoshihiro Suda,** Professor, University of Tokyo
  - Automated Driving Systems
- **Wei Chen,** Professor, Northwestern University
  - Multi-scale and Multi-dimensional Quantification and Propagation of Manufacturing Induced Uncertainty”
- **Fumihiko Kimura,** Professor Emeritus, University of Tokyo
  - IT Support for Product and Process Development

Technical Sessions

- Additive Manufacturing Sensing and Control I
- Additive Manufacturing Sensing and Control II
- Cutting and Machine Tools I
- Cutting and Machine Tools II
- Digital Design and Manufacturing I
- Digital Design and Manufacturing II
- Digital Design and Manufacturing III
- Flexible Automation in Manufacturing Systems I
- Flexible Automation in Manufacturing Systems II
- Industrial Robotics
- Manufacturing Controls and Machine Automation I
- Manufacturing Controls and Machine Automation II
- Mechatronics and Precision Manufacturing
- Methodology for Manufacturing I
- Sensing and Information Extraction I
- Sensing and Information Extraction II
- Sensing and Information Extraction III
- Smart/Sustainable Manufacturing I
- Smart/Sustainable Manufacturing II
- Smart/Sustainable Manufacturing III
- Textile and/or Yarn Process Automation
- Other topics I
- Other topics II

Registration Information

Participant

- Regular registration (after May 25, 2018): 60,000JPY
- Student registration: 30,000JPY

Guest

- Guest Fee (Welcome Party & Banquet): 15,000 JPY

We Look Forward to Seeing You!

Main Sponsors

- The Institute of Systems, Control and Information Engineers (ISCIE)
- The American Society of Mechanical Engineers (ASME)

Cooperative Societies

- The Japan Society of Mechanical Engineers
- The Japan Society for Precision Engineering
- The Society of Instrument and Control Engineers
- The Robotics Society of Japan
- Scheduling Society of Japan
- The Japanese Society for Artificial Intelligence

ASME DSCD Student & Young Members Report

Prepared by Carrie Hall

1. Student travel grants were made available for DSCC 2017 in Tysons Corner, Virginia to partially assist students with registration, travel and hotel costs. A total of 78 students were given travel support. Partial support of $150 was given to most applicants and best paper finalists received up to $600.

2. Six finalists for the final phase of the Student Best Paper Award competition were voted on by a panel of judges. The finalists were:

   - *Position and Linear Velocity Estimation for Position-Based Visual Servo Control Of An Aerial Robot in GPS-Denied Environments*
     Authors: Dejun Guo and Kam K. Leang

   - *A General Framework for Minimizing Energy Consumption of Series Elastic Actuators with Regeneration*
     Authors: Edgar Bolívar, Siavash Rezazadeh, and Robert Gregg

   - *Collision Cone Based Lane Changing Model for Collision Avoidance*
     Authors: Gihyeob An and Reza Langari

   - *Backstepping Control of Underactuated Planar Vehicles with Nonholonomic Constraints*
     Authors: Karl Ludwig Fetzer, Sergey Nersesov, and Hashem Ashrafiuon

   - *Controlling Physical Interactions: Humans Do Not Minimize Muscle Effort*
     Authors: Ryan Koeppen, Meghan E. Huber, Dagmar Sternad, and Neville Hogan

   - *Neuroadaptive Control for Trajectory Tracking of Indirect Drive Robots*
     Authors: Yu Zhao, Xiaowen Yu, and Masayoshi Tomizuka

   The winner of the best paper award was Dejun Guo from the University of Utah.

3. A special “Student Career Advising/Networking Event” was held at DSCC 2017. This event was led by by Herschel Pangborn and Ashley Armstrong and featured a collection of accomplished individuals from academia, national labs and industry, who shared their insights and provided advice based on their successful careers in the field of controls.

DSCD Newsletter: Report at the ACC Conference (June 2018)

Xu Chen and Jianguo Zhao

The DSCD Newsletter is electronically distributed to the DSCD mailing list every August and December. We publicize call for papers/proposals, conference information, educational activities, introduction of experimental platforms, job postings, as well as special issues in collaboration with guest editors.

2017 summer issue

The 2017 summer issue contained two features that pay tribute to the lives of two longterm community members: J. Karl Hedrick (1944-2017) and John J. Moskwa (1950-2017).

DSCD News-letter Summer 2017

August 16, 2017

DYNAMIC SYSTEMS AND CONTROL DIVISION NEWSLETTER

IN THIS ISSUE

Editor's Note

Dear colleagues,

This issue of ASME DSCD Newsletter contains the feature "In Memory of Professor Karl Hedrick" by the controls faculty from the Department of Mechanical Engineering, UC Berkeley, Andrew Alleyne, Joseph Beaman, Dong-il (Dan) Cho, Eduardo Misawa, Rajesh Rajamani, and A.Galip Ulsoy. The feature pays tribute to the life of Professor J. Karl Hedrick (1944-2017), a longtime community member, mentor, and advocate of control engineering. We hope you will be as inspired by his story as we are.

A second feature of this newsletter is "John J. Moskwa (1950 – 2017): Musician, Mechanic, and Engineer" by Eduardo Misawa. Professor Moskwa passed away on June 3 after battling pancreatic and liver cancer. We are sharing to you John's 2015 Newsletter article "Single-Cylinder Engine (SCE) Transient Test System" as a tribute to his individuality and passion for powertrain controls.

In the article "Young Investigators in Dynamic Systems and Controls," we speak with six 2016 awardees of the NSF CAREER award from the Dynamics, Control and Systems Diagnostics (DCSD) Program in the Division of Civil, Mechanical and Manufacturing Innovation (CMMI). In the dialogues, the young investigators shared their engagements with research and education.

We appreciate the great efforts of guest editors Dr. Peter Seiler Jr and Dr. Mahdi Shahbakhti, whose editing and outreach made the first feature possible in its current form. Future newsletters will continue to support special issues, in addition to community news such as call for papers/proposals, conference information, educational activities, introduction of experimental platforms, and job postings. We enthusiastically look forward to your future contributions.

2017 winter issue

The 2017 winter issue contained a summary of the 2017 ACC conference, an overview of the division's Biosystems and Healthcare TC, and Calls for Contributions to conferences and book chapters.

The 2017 American Control Conference – A Summary

Jing Sun, General Chair

Rajesh Rajamani, Program Chair

2017 Seattle ACC

TECHNICAL PROGRAM

The 2017 ACC received 1469 submissions with 204 invited papers and 1265 contributed papers. After thorough review, 944 papers were accepted, representing a ~64% acceptance rate. Those papers were organized in 19 parallel sessions for oral presentation. Other than regular and invited sessions, tutorial sessions and special sessions were also organized along with workshops and exhibits. Workshops were held on the Monday and Tuesday (May 22 and 23) preceding the main conference.

A Look Inside the Dynamic Systems & Control Division (DSCD)

— The Biosystems and Healthcare Technical Committee and its Operation

Call for Contributions

The ASME 2018 Dynamic Systems and Control Conference
September 30 – October 3, 2018
Hyatt Regency Atlanta, Atlanta, Georgia, USA

Coordinated by Xiaobo Tan, General Chair, DSCD 2018, on behalf of the Conference Organization Committee

2018 IEEE/ASME International Conference on Advanced Intelligent Mechatronics
July 9-12, 2018, Auckland, New Zealand

Contributed by Shane Xie and Kean Aw, General Chair and Co-Chair of AIM 2018, on behalf of the Conference Organization Committee.

News Briefing

Prof. Rajesh Rajamani and student Kalpesh Sirgal at University of Minnesota

CALL FOR CHAPTER PROPOSALS
Stability, Control and Application of Time-delay Systems

Contributed by Qingjian Gao, California State University Long Beach

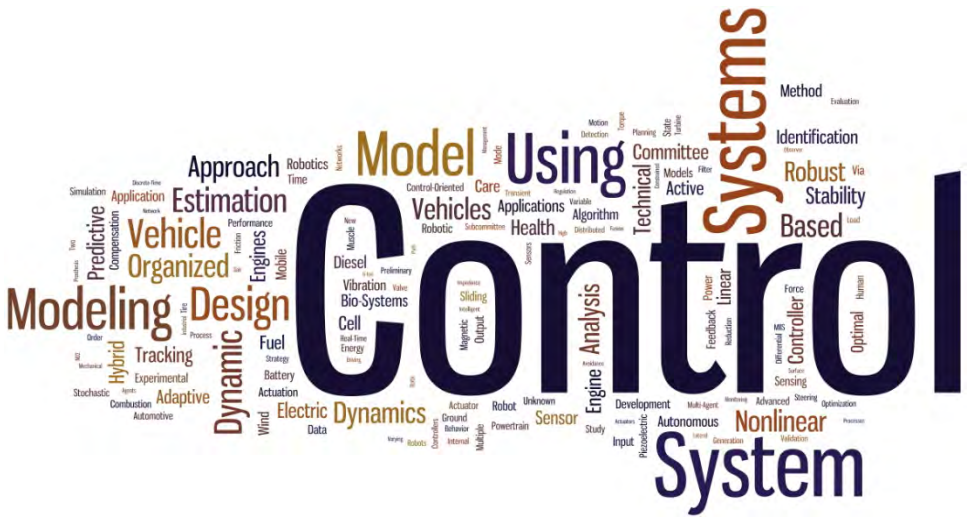
2018 summer issue

The 2018 summer issue is planned to be distributed to the community in August 2018 (call for contributions sent out on May 23 2018).

Please consider making your valuable contributions to the current and the future issues!

Our contact information:
Editor: Xu Chen, Tel: (860) 486-3688 E-mail: xchen@uconn.edu
Associate Editor: Jianguo Zhao, Tel: (970) 491-5927 E-mail: jianguo.zhao@colostate.edu

DSCD Newsletter Winter 2017



December 22, 2017

DYNAMIC SYSTEMS AND CONTROL DIVISION NEWSLETTER

IN THIS ISSUE

Editor's Note

Dear colleagues,

This issue of ASME DSCD Newsletter contains the feature "The 2017 American Control Conference – A Summary" by Jing Sun and Rajesh Rajamani, conference General Chair and Program Chair. The feature provides the conference statistics, the technical and social programs, this year's American Automatic Control Council Awards winners, and the 2017 ACC Student Best Paper Award winner.

The second main feature of this issue provides an "inside view" to one of the six technical committees (TCs) of the division. Jin-Oh Hahn, chair of the ASME DSCD Biosystems and Healthcare TC, shares with us the organization and operation of the TC, as well as its fast growth over the past five years.

We thank you for your support of the Newsletter in 2017, and look forward to your future submissions. The link to the division website and information about how to submit to the Newsletter are provided at the end of this issue, after three Calls for Contributions and a News Briefing.

May the magic and the wonder of the holiday season stay with you throughout the coming 2018.

Happy Holidays!

The 2017 American Control Conference – A Summary

Jing Sun, General Chair

Rajesh Rajamani, Program Chair

The 2017 American Control Conference was held Wednesday through Friday, May 24-26, 2017 in Seattle, Washington. The conference featured technical as well as social programs and attracted over 1350 attendees from 46 countries. The conference venue was the Sheraton Seattle, next to the Washington State Convention Center, just steps away from some of Seattle's best-known sights such as the Seattle Waterfront and the Pike Place Market, and minutes away by monorail to other Seattle landmarks such as the Space Needle.

TECHNICAL PROGRAM

The 2017 ACC received 1469 submissions with 204 invited papers and 1265 contributed papers. After thorough review, 944 papers were accepted, representing a ~64% acceptance rate. Those papers were organized in 19 parallel sessions for oral presentation. Other than regular and invited sessions, tutorial sessions and special sessions were also organized along with workshops and exhibits. Workshops were held on the Monday and Tuesday (May 22 and 23) preceding the main conference.

The conference technical program was kicked off Tuesday evening with a special evening session on big data science and applications, which was attended by over three hundred people. Two other evening special sessions, one on autonomous vehicles and intelligent transportation systems on Wednesday, and another on market commercialization of controls technology on Thursday, provided special themes for ACC 2017 and were all well attended.

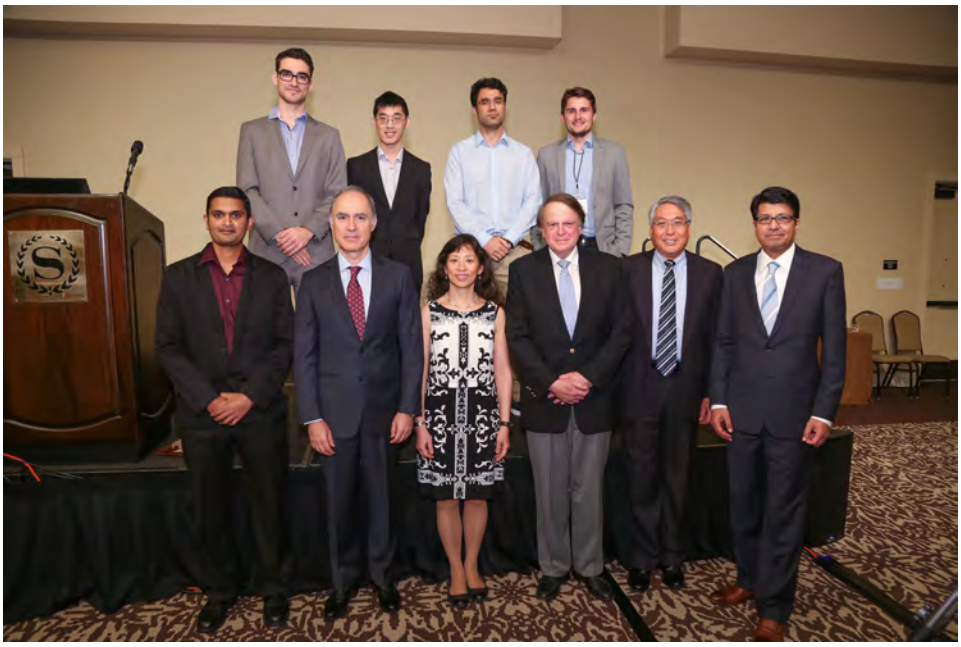
The full conference technical program formally started on Wednesday, May 24, with an opening session followed up by a plenary talk. AACC president Glenn Masada and IFAC president-elect Frank Allgower were introduced by the ACC 2017 General Chair Jing Sun, and made opening remarks to give overviews of the activities of AACC and IFAC. Then, Rajesh Rajamani, the Program Chair, introduced the plenary speaker Vijay Kumar, who gave a fascinating talk on control, planning and coordination for swarms of flying robots. The Wednesday's program included all 19 parallel sessions, a workshop for high school students organized by Bozenna Pasik-Duncan of the University of Kansas, and a special panel in the evening on autonomous vehicles and intelligent transportation systems.

Thursday's program started with two semi-plenary sessions, one by Javad Lavaei, the 2016 Eckman Award Winner, from the University of California Berkeley on convexification of polynomial optimization, and another by Jacquelien Scherpen from the University of Groningen on model order reduction. The day ended with several special sessions in the evening: one on going from theory to market commercialization featuring successful control entrepreneurs, one on "why should I study control theory" with a 12-member panel consisting of industry leaders, faculty members, and practicing engineers, and another one that provided curriculum vita review and feedback for students who will soon enter the job market.

The final day's program on Friday opened with two semi-plenaries: one by James Rawlings from the University of Wisconsin on model predictive control, and another by Harry Asada from MIT on data driven approaches to nonlinear systems control. Both were very well attended with highly engaged audiences who followed up with many questions in the Q&A session. These were followed by a full day of technical sessions and a well-attended closing reception.

AWARDS

AACC awards, as well as the ACC Student Best Paper Award given by the conference, were announced in an award ceremony held on Thursday before the conference banquet. John Baras received



The AACC award winners and ACC Best Student Paper Award finalists. Front row (from left): Ketan Salva (Eckman Award), Miroslav Krstic (Ragazzini Award), Lucy Pao (Control Engineering Practice Award), John Baras (Bellman Award), Glenn Masada (AACC president), Tariq Samad (AACC past-president). Back row: ACC Best Student Paper Finalists Mikhail Hayhoe, Yuh-Shyang Wang, Vahid Azimi, and Sebastian Fleischmann.

the Richard E. Bellman Control Heritage Award for his innovative contributions to control theory, stochastic systems, and networks, and academic leadership in systems and control.

Miroslav Krstic received the John R. Ragazzini Education Award for outstanding contributions to textbook writing, industrial collaboration, and mentoring of students entering the control field.

Lucy Y. Pao received the Control Engineering Practice Award for pioneering applications of advanced control to wind turbines and wind farms.

Ketan Salva received the Donald P. Eckman Award for fundamental contributions to cyber-physical systems, network flows, queuing systems, and combinatorial optimization applied to transportation and robotics.

The five finalists for the ACC Student Best Paper award were Vahid Azimi, Yuh-Shyang Wang, Mohsen Khadem, Mikhail Hayhoe and Sebastian Fleischmann. The award was given to Yuh-Shyang Wang and John Doyle (advisor).

SOCIAL PROGRAM

There were also several social events during the conference that were very well attended. The opening reception was held on Tuesday after the special session on big data. The conference lunch banquet was held on Thursday after the award ceremony, and had over 1300 attendees, reaching the banquet capacity limit at the hotel. Jordan Berg and Zongli Lin, General Chair and Program Chair of ACC 2018, took the stage before the banquet and extended their invitation to next year's conference with a creative musical video clip. The Friday closing reception provided the space for attendees to relax and connect, after a few intensive days of hard work and technical interactions.

Finally, we would like to thank Seattle (and whoever is responsible) for delivering such spectacular weather conditions during the conference days. We were told that it was almost a miracle to have such a stretch of good weather in late May in Seattle. It was a memorable week for all of us who worked on the Operating Committee, and hopefully for those who attended ACC 2017.

A Look Inside the Dynamic Systems & Control Division (DSCD)

— The Biosystems and Healthcare Technical Committee and its Operation

The DSCD currently has six technical committees (TCs) covering, respectively, *Automotive and Transportation Systems (ATS)*, *Energy Systems*, *Biosystems and Healthcare*, *Mechatronics*, *Robotics*, and *Vibrations*. In this feature, we speak with Dr. Jin-Oh Hahn, Assistant Professor of the University of Maryland at College Park and Chair of the *DSCD Biosystems and Healthcare TC*, about the committee's organization and operation. In our dialogs with Dr. Hahn, we talked about the history of the TC, its fast growth, and some of its bylaws.

Dr. Jin-Oh Hahn received BS and MS degrees in mechanical engineering from Seoul National University, Seoul, Korea, in 1997 and 1999, and PhD degree in mechanical engineering from Massachusetts Institute of Technology, Cambridge, MA, USA, in 2008. He is currently with the University of Maryland, College Park, MD, USA, where he is an Assistant Professor in the Department of Mechanical Engineering. His current research interests are systems and controls approach to health monitoring, diagnostics and maintenance of dynamic systems with emphasis on physiological monitoring, decision-support, and closed-loop control. Dr. Hahn is the recipient of the Best Biosystems and Healthcare Paper Award from the ASME DCSD Biosystems and Healthcare Technical Committee in 2017, the Young Investigator Program Award from the Office of Naval Research in 2014, and the Young Investigator Grant Award from the Korean-American Scientists and Engineers Association in 2013.

Q: Could you tell us a bit about the overall scope of the TC?

Jin-Oh: The Biosystems and Healthcare (BSHC) TC was established in 2012 and is still in its early years. The officers and members alike are constantly working to improve visibility of the BSHC TC and bring attention to the interesting and challenging research areas surrounding dynamic systems in the area of biosystems and healthcare.

The activities of the BSHC TC are aimed at improving understanding of biomedical dynamic systems and developing sensing and control system technologies to solve biomedical problems. The technical interests of the BSHC TC are broad and include dynamics of biological and biomedical systems, bio-sensors, bio-instrumentation, control systems for medical intervention, and rehabilitation.

Q: How large is the TC now? How did it grow to the current state?

Jin-Oh: The BSHC TC started from ~20 members in 2012 and has >50 members now. The BSHC TC has leveraged a few mechanisms to grow. One important mechanism is to extend the TC's invitation for contributions to its invited and special sessions at conferences to peers working in the domain of the TC's technical interest. The other important mechanism is to share the activities of the TC by way of its semi-annual TC Newsletter.

Q: What are the roles of the TC officers?

Jin-Oh: The BSHC TC has a few officer positions: Chair, Vice Chair, Secretary, Publicity Chair, and Past Chair. The Chair is responsible for leading the TC and representing the TC in the DSCD. The Vice Chair conducts the general business under the general direction of the Chair. The Secretary records meeting minutes and provides working support for the actions of the TC. The publicity chair is responsible for organizing the outreach activities of the TC. These duties could include serving as the editor of the BSHC TC's newsletter. The Past Chair serves as an advisor to the TC. The current officers of the TC are: Jin-Oh Hahn (Maryland, Chair), Davide Piovesan (Gannon, Vice Chair), Dumitru Caruntu (Texas Rio Grande Valley, Secretary), and Nitin Sharma (Pittsburgh, Publicity Chair). The Past Chairs of the BSHC TC include: Harry Asada (MIT, 2011), Jaydev Desai

(Georgia Tech, 2012), Rajesh Rajamani (Minnesota, 2013), Venkat Krovi (Clemson, 2014), Xiaopeng Zhao (Tennessee Knoxville, 2015), and Jun Ueda (Georgia Tech, 2016).

Q: How often do the TC members meet? How is a TC meeting organized?

Jin-Oh: The BSHC TC has been having an annual meeting at the DSCC. The meeting is casual, and includes the following activities: (1) self introduction, (2) approval of the past meeting minutes, (3) officer election, and (4) discussion of past, ongoing, and future TC activities. The BSHC TC is planning to have semi-annual TC meetings in the future, one at the DSCC and the other at the ACC.

Q: Any other activities for the TC?

Jin-Oh: The BSHC TC organizes invited and special sessions at conferences, including the annual ASME Dynamic Systems and Control Conference (DSCC) and the American Control Conference (ACC). The BSHC TC also publishes a semi-annual BSHC TC Newsletter, which includes an article on featured BSHC research as well as news from the TC members (including awards, publications, PhD graduates, and position openings). The BSHC TC also publishes Special Issues in journals focused on topics of interest to the TC. Finally, the BSHC TC presents an annual TC Best Paper Award to the paper selected by its award committee among those presented in the invited and special sessions organized by the TC at conferences.

Q: How can interested division members get engaged with the TC?

Jin-Oh: Interested division members can either attend the BSHC TC meetings, or personally contact anyone in the TC leadership. Then, the member will be affiliated with the TC and also included in the TC's mailing list to receive updates.

Q: Thank you very much for sharing with us in the DSCD Newsletter.

Jin-Oh: Thank you very much for this opportunity to share the current status of the BSHC TC with the division members. We will look forward to increasing participation from the division members in our activities!

Call for Contributions

The ASME 2018 Dynamic Systems and Control Conference
September 30 – October 3, 2018
Hyatt Regency Atlanta, Atlanta, Georgia, USA

Contributed by Xiaobo Tan, General Chair, DSCC 2018, on behalf of the Conference Organization Committee.

The 2018 Dynamic Systems and Control (DSC) Conference will be held on September 30 – October 3, 2018 at the Hyatt Regency Atlanta, located in the heart of downtown Atlanta, Georgia. The venue is one of the top Atlanta luxury hotels and is connected to the MARTA transit system and blocks away from major attractions such as Georgia Aquarium and the World of Coca-Cola. On behalf of the 2018 DSCC Organization Committee and the Dynamics Systems and Control Division (DSCD) of ASME, we cordially invite you to enjoy an exciting technical program and a unique opportunity to network.

The DSC conference is the showcase technical forum of the ASME Dynamic Systems and Control Division. It provides a focused and intimate setting for dissemination and discussion of the state of the art in dynamic systems and control research, with a mechanical engineering focus. The 2018 DSC Conference Technical Program will consist of sessions in all of the usual areas of interest to the Division that include, but are not limited to, automotive and transportation systems, bio-systems and health care, energy systems, mechatronics, modeling, identification, intelligent systems, robotics, vibrations, and smart structures. Highlights of the 2018 DSCC will include:

- Four plenary talks given by distinguished scholars, including the Oldenburger Lecture and the Nyquist Lecture.
- Workshops and tutorials that are focused on emerging topics.
- Invited and special sessions on technical tracks and funding programs that are of interest to the DSC community.
- Student programs including Best Student Paper competition, networking with faculty recruiters, and networking with industry.
- Exhibits by industry.
- Extensive networking opportunities during the opening reception, continental breakfasts, the banquet, and the farewell lunch.

Online access to conference papers will be given to all registered attendees at the start of the conference. Following the event, the official proceedings of the conference are published in the ASME Digital Collection, and will be submitted to all major indexers including EI Complex, Scopus, and the ISI Conference Proceedings Citation Index.

Conference Website

https://www.asme.org/events/dscc

Important Dates

- Submission of invited session proposals **- April 2, 2018**
- Submission of contributed and invited papers **- April 9, 2018**
- Notification of acceptance/rejection **- May 28, 2018**
- Submission of final papers **- July 9, 2018**

2018 IEEE/ASME International Conference on Advanced Intelligent Mechatronics
July 9-12, 2018, Auckland, New Zealand

Contributed by Shane Xie and Kean Aw, General Chair and Co-Chair of AIM 2018, on behalf of the Conference Organization Committee.

The 2018 IEEE/ASME International Conference on Advanced Intelligent Mechatronics (AIM 2018) will bring together an international community of experts to discuss the state-of-the-art for new research results, perspectives of future developments, and innovative applications relevant to mechatronics, robotics, control, and automation. AIM 2018 will be held on July 9-12, 2018, Auckland, New Zealand. The sponsors and organisers of AIM 2018 invite submissions of high qual-

ity mechatronics research papers describing original work, including the following topics: Actuators, Automotive Systems, Bioengineering, Data Storage Systems, Electronic Packaging, Fault Diagnosis, Human-Machine Interfaces, Industry Applications, Information Technology, Intelligent Systems, Machine Vision, Manufacturing, Micro-Electro-Mechanical Systems, Micro/Nano Technology, Modeling and Design, System Identification and Adaptive Control, Motion Control, Vibration and Noise Control, Neural and Fuzzy Control, Opto-Electronic Systems, Optomechatronics, Prototyping, Real-Time and Hardware-in-the-Loop Simulation, Robotics, Sensors, System Integration, Transportation Systems, Smart Materials and Structures, Energy Harvesting, and other frontier fields.

The conference schedule is as follows:
- February 15, 2018 - Submission of Special & Invited Session Proposals
- February 19, 2018 - Submission of Contributed & Invited Papers
- February 28, 2018 - Submission of Tutorials & Workshop Proposals
- April 2, 2018 - Notification of Paper Status
- May 15, 2018 - Submission of Final Papers
- May 28, 2018 - Advanced Registration

For more information, please visit the conference website at **http://www.aim2018.org/** or contact the General Chair and General Co-Chair:

General Chair
Professor Shane Xie FIPENZ, SMIEEE
Chair in Robotics and Autonomous Systems
School of Electronic and Electrical Engineering, University of Leeds
LS2 9JT, UK
Email: s.q.xie@leeds.ac.uk

General Co-Chair
Associate Professor Kean C Aw
Department of Mechanical Engineering
Faculty of Engineering
University of Auckland
20 Symonds Street, NZ
Email: k.aw@auckland.ac.nz

CALL FOR CHAPTER PROPOSALS Stability, Control and Application of Time-delay Systems

Contributed by Qingbin Gao, *California State University Long Beach.*

Delays are ubiquitously observed in various real-world systems due to the unavoidable time required to gather sensing data needed for decision-making, to generate control decisions, and to execute these decisions. These delays are crucial factors that may deteriorate or even destabilize the performance of the systems. This book proposes to include fundamental topics to treat and analyze time-delay systems, including but not limited to stability analysis, control synthesis and application of time delay systems.

The purpose of this book is to introduce the state-of-the-art research in time-delay systems from top-notch researchers in this field. Delays exist universally in engineering systems and processes, such as manufacturing process, networked control systems, tele-operation of robots, multi-robot systems, internal combustion engines, and traffic dynamics. However, there are only a limited number of books on time delay systems in the market, a new book on this topic would be highly desirable.

The book gives a systematic and almost self-contained description of analysis, designing, or application exploring of time delay systems along the adequate designs of integrated modelling, control and frequency characterizations. Topics in the individual chapters range from a generally theoretical time delay systems to more complex class of time delay systems, and to some selective applications, for instance. The main feature in common of all the encompassed contributions in this book is that of creating certain synergies of modelling, analysis, control, computing and applications of time delay systems in order to achieve robust stability while retaining desired performance quality.

Researchers and practitioners are invited to submit on or before ***December 29, 2017***, a chapter proposal about 200 to 500 words clearly explaining the mission and concerns of his or her proposed chapter with preferable outlines. An email showing the interest for the proposal submission beforehand would be greatly appreciated. Authors will be notified by ***December 31, 2017*** about the status of their proposals and sent chapter guidelines. Full chapters are expected to be submitted by ***May 1, 2018***.

This book is scheduled to be published by Elsevier, an information and analytics company and one of the world's major providers of scientific, technical, and medical information. For additional information regarding the publisher, please visit https://www.elsevier.com/.

Important Dates
December 29, 2017: Proposal for Book Chapter
December 31, 2017: Notification of Acceptance
May 1, 2018: Full Chapter Submission
July 1, 2018: Review Results Returned
September 1, 2018: Final Chapter Submission

Editorial Advisory Board Members (Inquiries could be forwarded to):
Qingbin Gao, *California State University Long Beach, USA:* qingbin.gao@csulb.edu
Hamid Reza Karimi, *Politecnico di Milano*, Italy: hamidreza.karimi@polimi.it

News Briefing

Prof. Rajesh Rajamani and student Kalpesh Singal at University of Minnesota were awarded US Patent 9,797,819 titled "Sensor for Measurement of Tension," on October 24, 2017. Their patented sensor is being commercialized through a start-up company Focus Start led by CEO Daniel Sigg, a former Medtronic and medical device industry executive. The sensor is used to measure tension in soft tissues such as ligaments, tendons and muscles during orthopedic surgeries.

Handheld tissue tension measurement sensor

Links and Contacts

- ASME International: http://www.asme.org
- Dynamic Systems & Control Division (DSCD) Home Page: www.asme-dscd.org/

The Dynamic Systems and Control Division Newsletter is published twice annually (Summer & Winter). Please submit your items for publication by e-mail to the editorial office:
Editor: Xu Chen, University of Connecticut, Tel: (860) 486-3688 E-mail: xchen@uconn.edu
Associate Editor: Jianguo Zhao, Colorado State University, Tel: (970) 491-5927 E-mail: jianguo.zhao@colostate.edu

2018 AMERICAN CONTROL CONFERENCE

MILWAUKEE, WI
JUNE 27-29, 2018

DETAILS CAN BE FOUND ON THE CONFERENCE WEB SITE AT HTTP://ACC2018.A2C2.ORG

The 2018 AMERICAN CONTROL CONFERENCE will be held Wednesday through Friday, June 27-29, at the Hilton Milwaukee City Center Hotel in the heart of Milwaukee, Wisconsin – mere steps from the Lake Michigan shoreline. The conference venue is near nightlife, restaurants, shopping, and entertainment, including the Henry Meir Festival Grounds - host to the world's largest music festival, SummerFest, which will celebrate its opening day alongside the ACC.

The ACC is the annual conference of the American Automatic Control Council (AACC), the U.S. national member organization of the International Federation for Automatic Control (IFAC). National and international society co-sponsors of ACC include American Institute of Aeronautics and Astronautics (AIAA), American Institute of Chemical Engineers (AIChE), Applied Probability Society (APS), American Society of Civil Engineering (ASCE), American Society of Mechanical Engineers (ASME), IEEE Control Systems Society (IEEE-CSS), International Society of Automation (ISA), Society for Modeling & Simulation International (SCS), and Society for Industrial & Applied Mathematics (SIAM).

The 2018 ACC technical program will comprise several types of presentations in regular and invited sessions, tutorial sessions, and special sessions along with workshops and exhibits. Submissions are encouraged in all areas of the theory and practice of automatic control.

Photographs courtesy of VISIT Milwaukee

DSCC 2018

ATLANTA

THE ASME 2018 DYNAMIC SYSTEMS AND CONTROL CONFERENCE
September 30 – October 3, 2018
HYATT REGENCY ATLANTA
ATLANTA, GEORGIA

The DSC conference is the showcase technical forum of the ASME Dynamic Systems and Control Division. It provides a focused and intimate setting for dissemination and discussion of the state of the art in dynamic systems and control research, with a mechanical engineering focus. The 2018 DSC Conference Technical Program will consist of sessions in all of the usual areas of interest to the Division that include, but are not limited to, automotive and transportation systems, bio-systems and health care, energy systems, mechatronics, modeling, identification, intelligent systems, robotics, vibrations, and smart structures.

SUBMISSION OF PAPERS FOR REVIEW: APRIL 9, 2018

https://www.asme.org/events/dscc

DSCD Website Report

193rd Division Meeting, Dynamic Systems and Control Division, ASME International
2018 American Control Conference, Milwaukee, Wisconsin, Wisconsin Center

Chairman Meckl and Members of the DSCD:

My apologies for not being able to attend this year's Division meeting. This document attempts to provide a brief update on the Division's website status.

Division Website Access

At some point between March 30th and May 14th of this year, the Division website of many years, located at asme-dscd.org, became inaccessible. It remains inaccessible as of 9 am (EST) on Saturday, June 23rd, 2018. When visiting the site, a valid connection can be made, but zero bytes of data are returned. This suggests that the server is operational, but is either malfunctioning, or has been intentionally disabled. It is my understanding that ASME (not DSCD) has always hosted this server, and they've granted us permission to edit the site's content. Additionally, the domain name is registered by ASME (not the Division), so we have no ability to redirect visitors to a different webserver. The most recent online copy of the Division's website (that I can locate) is found in the Internet Archive, at https://web.archive.org/web/20180330204337/http://asme-dscd.org/.

Past Conference Data

Concern has been expressed about archiving data from past DSCC events. The Division is attempting to recover what information remains available online. Some conference data is available on ASME's websites. Tim Graves at ASME has provided the following links, which contain varying levels of content:

2018: http://www.asme.org/events/dscc
2017: http://www.asme.org/events/dscc2017
2016: unavailable
2015: http://www.asmeconferences.org/DSCC2015/
2014: http://www.asmeconferences.org/DSCC2014/
2013: http://www.asmeconferences.org/DSCC2013/ (dead link)
2012: http://www.asmeconferences.org/DSCC2012/ (external link)
2011: http://www.asmeconferences.org/DSCC2011/ (bad link to DSCC 2015)
2010: unavailable
2009: unavailable
2008: unavailable

For conferences before 2014, it looks like the ASME site is merely providing a link to an external site. For example, the 2012 conference info appears to be hosted at Penn State (http://mne.psu.edu/dscc2012/). If ASME didn't host the early DSCC websites, then it's possible that external institutions have long since deleted the conference data.

Renewal of dsc-conference.org Domain Name

An auxiliary domain name, dsc-conference.org, was registered by the Division in July, 2007. My assumption is that this was to provide an online presence for promoting the initial DSCC event in 2008. The domain name has been repeatedly renewed by the Division over the intervening years. The Division's registration of this domain expires next month, on July 9th, 2018.

The dsc-conference.org domain currently does nothing more than forward a user to the DSCC 2015 page. It was never used for the main division website. As such, I don't see much benefit to keeping the dsc-conference.org domain. Nobody is going to go looking for conference info at that URL, and Google will direct search queries to the ASME servers that host current conference information. However, if the Division feels differently, action should be taken very soon, to ensure the domain name remains registered with DSCD.

Jeff Shelton, DSCD Webmaster

ASME Dynamic Systems and Control Magazine

VISION

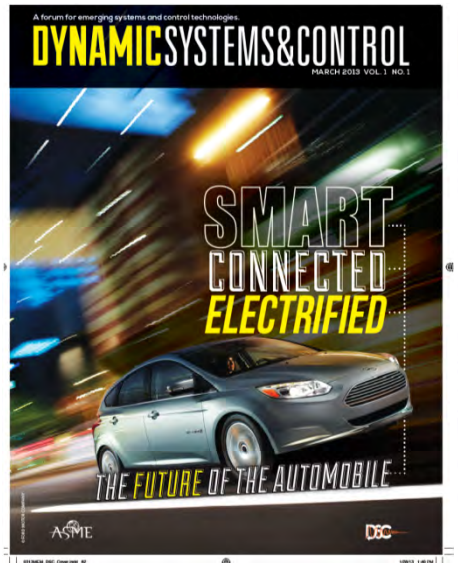
The *Dynamic Systems and Control Magazine* aims to be the professional forum for the members of the ASME Dynamic Systems and Control Division, with an emphasis on the highest quality expository articles on important and emerging topics, society events, and people active in the division.

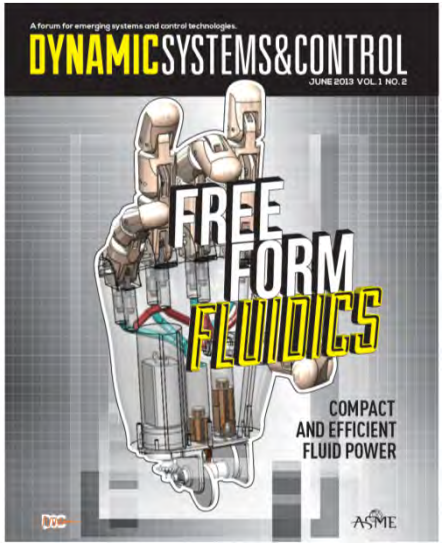
Background

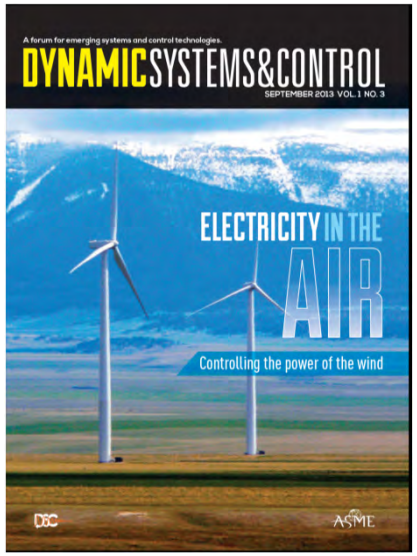
- *Dynamic Systems and Control Magazine* has been published quarterly (March, June, September and December) since beginning of 2013 as a 24-page supplement to ASME *Mechanical Engineering Magazine*.

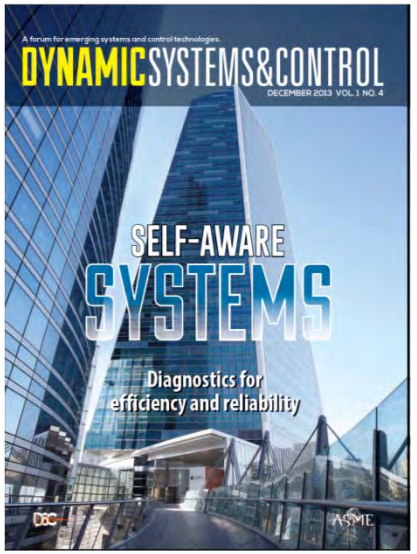
	Cost	Circulation	Editor
2013-2014	$12,000 per issue	All ASME members	Galip Ulsoy
2015-2016	$28,200 per issue	All ASME members	Peter Meckl
2017-	$15,000 per issue	DSCD primary and secondary members	Peter Meckl

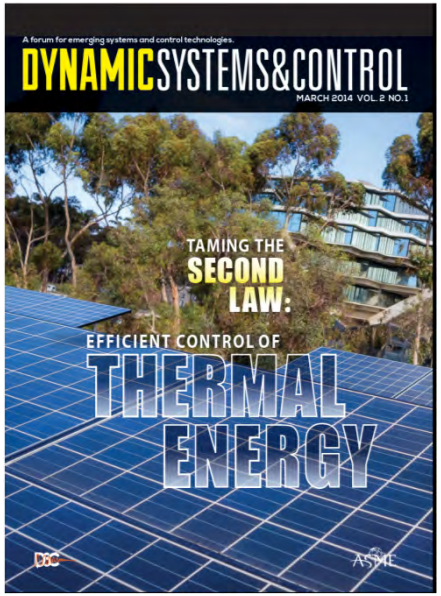
Issues Completed so Far – 2013-14



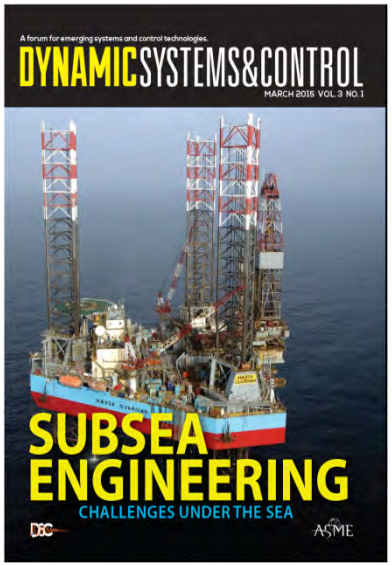


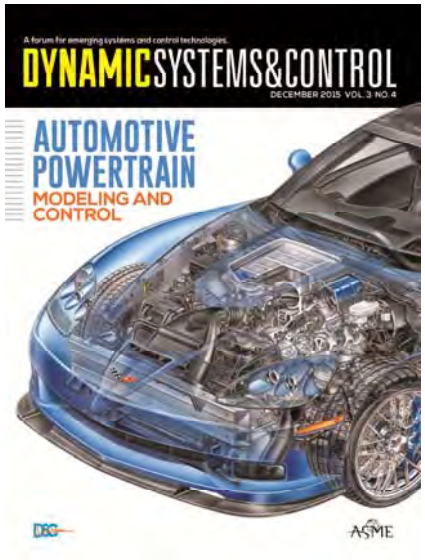




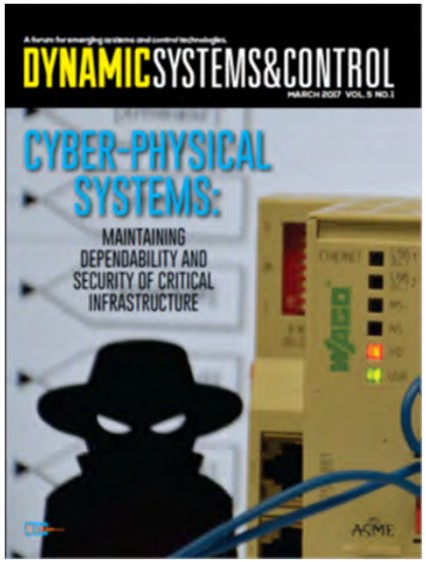


Issues Completed so Far – 2015-16





Issues Completed so Far – 2017-18

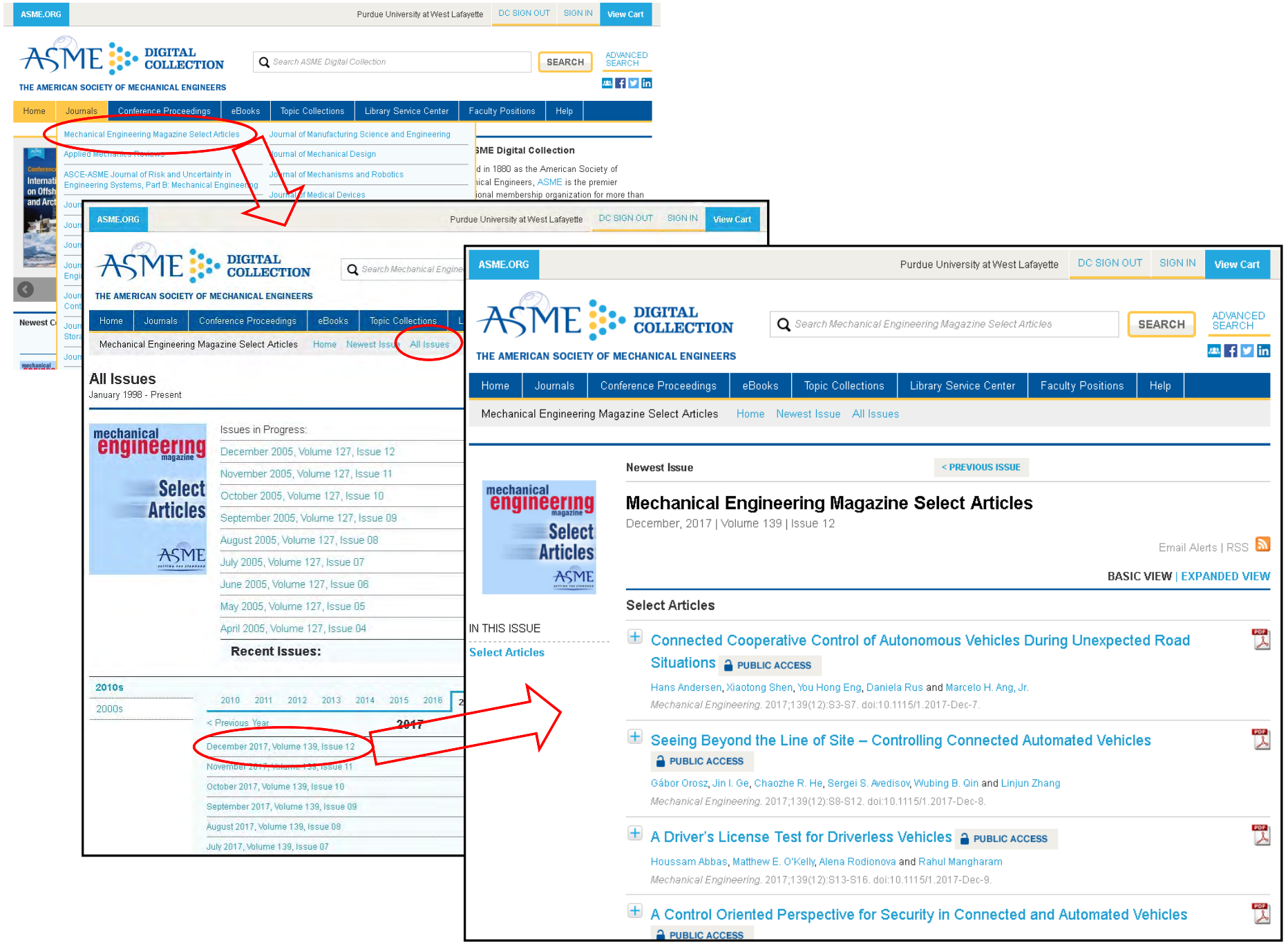


Forthcoming Issues

- Sep. 2018 issue (v6n3) will be guest edited by Jordan Berg and will focus on Humanitarian Engineering.
- Themes for Future issues include Information Theory, Electric Vehicles and the Grid, and Multi-Agent Systems.

Some Issues

- Inclusion of DSC Magazine in major indexes (e.g., Engineering Index, Google Scholar, Web of Science) is important. So far, this seems to be taking place, but not always consistently.
- The DSC magazine is now included in the ASME Digital Collection.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ASCE-ASME Journal of Risk and Uncertainty in Engineering Systems, Part B: Mechanical Engineering
Journal of Mechanisms and Robotics
Journal of Medical Devices
All Issues
January 1998 - Present
Issues in Progress:
December 2005, Volume 127, Issue 12
November 2005, Volume 127, Issue 11
October 2005, Volume 127, Issue 10
September 2005, Volume 127, Issue 09
August 2005, Volume 127, Issue 08
July 2005, Volume 127, Issue 07
June 2005, Volume 127, Issue 06
May 2005, Volume 127, Issue 05
April 2005, Volume 127, Issue 04
Recent Issues:
2010s
2000s
2010 2011 2012 2013 2014 2015 2016
< Previous Year
2017
December 2017, Volume 139, Issue 12
November 2017, Volume 139, Issue 11
October 2017, Volume 139, Issue 10
September 2017, Volume 139, Issue 09
August 2017, Volume 139, Issue 08
July 2017, Volume 139, Issue 07
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December, 2017 | Volume 139 | Issue 12
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Connected Cooperative Control of Autonomous Vehicles During Unexpected Road Situations
PUBLIC ACCESS
Hans Andersen, Xiaotong Shen, You Hong Eng, Daniela Rus and Marcelo H. Ang, Jr.
Mechanical Engineering. 2017;139(12):S3-S7. doi:10.1115/1.2017-Dec-7.
Seeing Beyond the Line of Site – Controlling Connected Automated Vehicles
PUBLIC ACCESS
Gábor Orosz, Jin I. Ge, Chaozhe R. He, Sergei S. Avedisov, Wubing B. Qin and Linjun Zhang
Mechanical Engineering. 2017;139(12):S8-S12. doi:10.1115/1.2017-Dec-8.
A Driver's License Test for Driverless Vehicles
PUBLIC ACCESS
Houssam Abbas, Matthew E. O'Kelly, Alena Rodionova and Rahul Mangharam
Mechanical Engineering. 2017;139(12):S13-S16. doi:10.1115/1.2017-Dec-9.
A Control Oriented Perspective for Security in Connected and Automated Vehicles
PUBLIC ACCESS

Financials

- Current cost is $15,000 per issue, for a total of $60,000 per year. This represents a significant share of the total annual DSCD budget and is unsustainable.
- I have been in touch with John Falcioni, the Editor-in-Chief of Mechanical Engineering, and we are looking into several options for funding the magazine, including looking for sponsors or advertisers, or charging a membership premium to each DSCD member.

Next Steps

- Continue to work with ASME to develop a mechanism to enable the magazine to be sustainably supported.

Comments and Suggestions?

- Articles:
  - Topics?
  - Length?
  - Scope?
- DSCD items:
  - Awards, books, conferences?
  - Editorial, articles from DSCD chairs?
  - Featured DSCD member profile?
  - DSCD or control history feature?

Further Comments?

- Those interested in the DSC Magazine can contact:
  - Peter Meckl, Editor, meckl@purdue.edu

ASME DSCD Honors & Awards Committee
Report to Executive Committee and Division Meeting (items 1-3)
ACC: June 27, 2018

Chair: Dawn Tilbury
Vice-Chair: Santosh Devasia
Members: Neville Hogan, Kim Stelson, Eric Tseng, Qian Wang, Rama Yedavalli

Activities:

1. Nominations for the Oldenburger Award were due on Jan. 31, 2018. No new nominations were received, and the previous nominations had expired. Approval was granted from ASME to extend the deadline to March 3.

   The committee considered the valid nominations for the ASME Rufus Oldenburger Medal, and chose a candidate. The winner is Roberto Horowitz; the award will be presented at the DSCC.

2. In February, along with the notice that the Oldenburger deadline would be extended, DSCD members were reminded that nominations for the three "even year" awards will be due at the end of June:

   a. Michael Rabins Leadership Award
   b. Charles Stark Draper Innovative Practice Award
   c. Henry Paynter Outstanding Investigator Award

   Although the deadline is approaching quickly, members are encouraged to consider nominating outstanding candidates for these awards.

3. It was noticed that the awards given at the DSCC last October are not yet updated on the ASME website. Email was sent to Erin Dolan requesting that the website be updated. https://www.asme.org/about-asme/get-involved/honors-awards/unit-awards