Zhen Kan

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Formal Education

PhD in Mechanical Engineering (ME) - Dec. 2011
University of Florida, Gainesville, FL, USA

Master of Engineering in Mechanical Engineering (ME) - Aug. 2007
Hefei University of Technology, Hefei, China

Bachelor of Engineering in Mechanical Engineering (ME) - Aug. 2005
Hefei University of Technology, Hefei, China

Professional Experience

- *Professor* (Aug. 2019 - present)
  Department of Automation, *University of Science and Technology of China,* Hefei, Anhui, China
- *Assistant Professor* (Aug. 2016 – Aug. 2019)
  Department of Mechanical Engineering, *The University of Iowa*, Iowa City, IA
- *Postdoctoral Research Associate* (Jan. 2012 - Aug. 2016)
  University of Florida-REEF/AFRL(Air Force Research Laboratory, Eglin Air Force Base, USA)
- *Graduate Research/Teaching Assistant* (Aug. 2007 – Dec. 2011)
  Department of Mechanical and Aerospace Engineering, *University of Florida*, Gainesville, FL

Research Interests

- Nonlinear Control
- Robotics
- Formal Methods
- Networked Control Systems

Publications

Book Chapters

2. Zhen Kan, John M. Shea, and Warren E. Dixon, "Navigation Function Based Decentralized Control of A Multi-agent System with Network Connectivity Constraints," *in Examining Robustness and Vulnerability of Critical Infrastructure Networks*, Edited by S. Butenko, E. L. Pasiliao, V. Shylo, NATO Science for Peace and Security Series - D:Information and Communication Security, Vol 35, pp. 104-119, 2014.
1. A. Dani, Z. Kan, N. Fischer, and W. E. Dixon, "Real-time Structure and Motion Estimation in Dynamic Scenes using a Single Camera," *in Robotic Vision: Technologies for Machine Learning and Vision Applications,* Edited by Jose Garcia and Miguel Cazorla, IGI Global Publication, pp. 173-191, July 12, 2012

Journal Papers

62. Z. Zhou, S. Wang, Z. Chen, M. Cai, and Z. Kan, "A Novel Framework for Improved Grasping of Thin and Stacked Objects," *IEEE Transactions on Artificial Intelligence*, to appear
61. C. Zhang, S. Lin, H. Wang, Z. Chen, S. Wang, and Z. Kan*, "Data-Driven Safe Policy Optimization for Black-Box Dynamical Systems with Temporal Logic Specifications," *IEEE Transactions on Neural Networks and Learning Systems*, to appear
60. M. Pi, Z. Li, Q. Li, Y. Kang, Z. Kan, and R. Song, "Human-in-the-loop Control of Robotic Leg Prostheses with Sensory Feedback," *IEEE/ASME Transactions on Mechatronics*, to appear

59 S. Wang, Z. Zhou, B. Li, Z. Li, and Z. Kan, "Multi-modal Interaction with Transformers: Bridging Robots and Human with Natural Language," *Robotica*, to appear

58. H. Wang, H. Zhang, L. Li, Z. Kan, and Y. Song, "Task-Driven Reinforcement Learning with Action Primitives for Long-Horizon Manipulation Skills," *IEEE Transactions on Cybernetics*, to appear

57. Z. Zhou, Z. Chen, M. Cai, Z. Li, Z. Kan, and C. Su, "Vision-Based Reactive Temporal Logic Motion Planning for Quadruped Robots in Unstructured Dynamic Environments," *IEEE Transactions on Industrial Electronics*, to appear

56. Z. Zhou, S. Wang, Z. Chen, M. Cai, H. Wang, Z. Li, and Z. Kan, "Local Observation Based Reactive Temporal Logic Planning of Human-Robot Systems," *IEEE Transactions on Automation Science and Engineering*, conditionally accepted

55. H. Zhang, H. Wang, and Z. Kan, "Exploiting Transformer in Sparse Reward Reinforcement Learning for Interpretable Temporal Logic Motion Planning," *IEEE Robotics and Automation Letters*, Vol. 8, No. 8, pp. 4831-4838 (2023)

54. L. Li, Z. Chen, H. Wang, and Z. Kan, "Fast Task Allocation of Heterogeneous Robots with Temporal Logic and Inter-Task Constraints," *IEEE Robotics and Automation Letters*, Vol. 8, No. 8, pp. 4991-4998 (2023)

53. P. Huang, Z. Li, M. Zhou, and Z. Kan, "Divergent Component of Motion Planning and Adaptive Repetitive Control for Wearable Walking Exoskeletons," *IEEE Transactions on Cybernetics*, to appear

52. 李保罗，蔡明钰，阚震, "线性时序逻辑引导的安全强化学习," 《控制与决策》， 已录用, Vol. 38, No. 7, pp. 1835-1844 (2023)

51. S. Wang, R. Yang, B. Li, and Z. Kan, "Structural Parameter Space Exploration for Reinforcement Learning via a Matrix Variate Distribution," *IEEE Transactions on Emerging Topics in Computational Intelligence*, Vol. 7, No. 4, pp. 1025-1035 (2023)

50. C. Zhong, S. Zhao, Y. Liu, Z. Li, Z. Kan, and Y. Feng "A flexible wearable e-skin sensing system for robotic teleoperation," *Robotica*, Vol. 41, No. 3, pp. 1025-1038 (2023)

49. G. Li, J. Xu, Z. Li, C. Chen, and Z. Kan, "Sensing and Navigation of Wearable Assistance Cognitive Systems for the Visually Impaired," *IEEE Transactions on Cognitive and Developmental Systems*, Vol. 15, No. 1, pp. 122-133(2023)

48. M. Cai, S. Xiao, J. Li, and Z. Kan, "Safe Reinforcement Learning under Temporal Logic with Reward Design and Quantum Action Selection," *Scientific Reports*, Vol. 13, No. 1, pp. 1925 (2023)

47. M. Cai, S. Xiao, Z. Li, and Z. Kan, "Optimal Probabilistic Motion Planning with Potential Infeasible LTL Constraints," *IEEE Transactions on Automatic Control*, Vol. 68, No. 1, pp. 301-316 (2023) [**Full Paper**]

46. Z. Li, G. Li, X. Wu, Z. Kan, H. Su, and Y. Liu, "Asymmetric Cooperation Control of Dual-Arm Exoskeletons Using Human Collaborative Manipulation Models," *IEEE Transactions on Cybernetics,* Vol. 52, No. 11, pp. 12126-12139 (2022)

45. Z. Li, X. Li, Q. Li, H. Su, Z. Kan, and W. He, "Human-In-the-Loop Control of Soft Exosuits Using Impedance Learning on Different Terrains," *IEEE Transactions on Robotics*, Vol. 38, No. 5, pp. 2979-2993 (2022)

44. H. Zhang and Z. Kan, "Temporal Logic Guided Meta Q-Learning of Multiple Tasks," *IEEE Robotics and Automation Letters*, Vol. 7, No. 3, pp. 8194-8201 (2022)

43. S. Wang, Z. Zhou, and Z. Kan, "When Transformer Meets Robotic Grasping: Exploits Context for Efficient Grasp Detection," *IEEE Robotics and Automation Letters*, Vol. 7, No. 3, pp. 8170-8177 (2022)

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41. H. Gao, F. Chen, Z. Hao, X. He, H. Su, K. Li, and Z. Kan, "Adaptive Finite-Time Trajectory Tracking Control of Autonomous Vehicles That Experience Disturbances and Actuator Saturation," *IEEE Intelligent Transportation Systems Magazine*, Vol. 14, No. 2, pp. 80-91 (2022)

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38. Z. Li, M. Cai, S. Xiao, and Z. Kan, "Online Motion Planning with Soft Metric Interval Temporal Logic in Unknown Dynamic Environment," *IEEE Control Systems Letters*, Vol. 6, pp. 2293-2298 (2022)
37. H. Gao, F. Guo, J. Zhu, Z. Kan, and X. Zhang, "Human Motion Segmentation Based on Structure Constraint Matrix Factorization," *Science China Information Science*s, Vol. 65, pp. 119103:1–119103:2 (2022)
36. S. Meng and Z. Kan, "Deep Reinforcement Learning Based Effective Coverage Control with Connectivity Constraints," *IEEE Control Systems Letters*, Vol. 6, pp. 283-288 (2022)
35. S. Xiao, B. She, S. Mehta, and Z. Kan, ""Design of Controllable Leader-Follower Networks via Memetic Algorithms," *Advances in Complex System*s, pp. 2150004 (2021)
34. M. Cai, M. Hasanbeig, S. Xiao, A. Abate, and Z. Kan, "Modular Deep Reinforcement Learning for Continuous Motion Planning with Temporal Logic," *IEEE Robotics and Automation Letters*, Vol. 6, No. 4, pp. 7973-7980 (2021)
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25. Z. Li, Y. Liu, H. Liu, and Z. Kan, "Skill Transfer Learning for Autonomous Robots and Human-Robot Cooperation: A Survey," *Robotics and Autonomous Systems*, Vol. 128, 103515 (2020)
24. Y. Liu, Z. Li, H. Liu, Z. Kan, and B. Xu, "Bio-inspired Embodiment for Intelligent Sensing and Dexterity in Fine Manipulation: A Survey," *IEEE Transactions on Industrial Informatics*, Vol. 16, No. 7, pp. 4308-4321 (2020)
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22. B. She, S. S. Mehta, C. Ton, and Z. Kan, "Controllability Ensured Leader Group Selection on Signed Multi-Agent Networks," *IEEE Transactions on Cybernetics*, Vol. 50, No. 1, pp. 222-232 (2020)
21. X. Wu, Z. Li, and Z. Kan, H. Gao, "Reference Trajectory Reshaping Optimization and Control of Robotic Exoskeletons for Human-Robot Co-Manipulation," *IEEE Transactions on Cybernetics*, Vo. 50, No. 8, pp. 3740-3751 (2020)
20. B. She, Z. Kan, "Algebraic Topological Characterizations of Structural Balance in Signed Graphs," *Automatica*, Vol. 107, pp. 61-67 (2019)
19. S. S. Mehta, C. Ton, M. Rysz, Z. Kan, E. A. Doucette, and J. W. Curtis, "New Approach to Visual Servo Control Using Terminal Constraints," *Journal of the Franklin Institute*, Vol 356, No. 10, pp. 5001-5026 (2019)
18. T. Yucelen, Z. Kan, and E. Pasiliao, "Finite-Time Cooperative Engagement," *IEEE Transactions on Automatic Control*, Vol. 64, No. 8, pp. 3521-3526 (2019)

17. Z. Kan, E. A. Doucette, and W. E. Dixon, "Distributed Connectivity Preserving Target Tracking with Random Sensing," *IEEE Transactions on Automatic Control*, Vol. 64, No. 5, pp. 2166-2173 (2019)
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15. J. Klotz, S. Obuz, Z. Kan, and W. E. Dixon, "Synchronization of Uncertain Euler-Lagrange Systems with Uncertain Time-varying Communication Delays," *IEEE Transactions on Cybernetics*, Vol 48. No. 2, pp. 807-817 (2018)
14. C. Ton, Z. Kan, and S. S. Mehta, "Obstacle Avoidance Control of a Human-in-the-loop Mobile Robot Systems Using Harmonic Potential Fields," *Robotica,* Vol. 36, No. 4, pp. 463-483 (2018)
13. C. Ton, S. S. Mehta, and Z. Kan, "Super-Twisting Control of Double Integrator System with Unknown Constant Control Direction," *IEEE Control System Letters,* Vol 1, No. 2, pp. 370-375 (2017)
12. T. Cheng, Z. Kan, J. Klotz, J. Shea, and W. E. Dixon, "Event-Triggered Control of Multi-agent Systems for Fixed and Time-varying Network Topologies," *IEEE Transactions on Automatic Control*, Vol. 62, No. 10, pp. 5365-5371 (2017).
11. Z. Kan, T. Yucelen, E. Doucette, and E. Pasiliao, "A Finite-Time Consensus Framework over Time-Varying Topologies with Temporal Constraints," *ASME Journal of Dynamic Systems, Measurement, and Control*, Vol. 139, No. 7, 0710121-0710126 (2017).
10. Z. Kan, J. Klotz, J. M. Shea, E. A. Doucette, and W. E. Dixon, "Decentralized Rendezvous of Nonholonomic Robots with Sensing and Connectivity Constraints," *ASME Journal of Dynamic Systems, Measurement, and Control*, Vol. 139, No. 2, pp. 0245011-0245017 (2017).
9. Z. Kan, J. M. Shea, and W. E. Dixon, "Leader-Follower Containment Control Over Directed Random Graphs," *Automatica*, Vol. 66, pp. 56-62 (2016).
8. S. S. Mehta, C. Ton, Z. Kan, J. W. Curtis, "Vision-Based Navigation and Guidance of a Sensorless Missile," *Journal of the Franklin Institute*, Vol. 352, No. 12, pp. 5569-5598 (2015).
7. Z. Kan, J. Klotz, E. L. Pasiliao, and W. E. Dixon, "Containment Control for a Social Network with State-Dependent Connectivity," *Automatica*, pp. 86-92 (2015).
6. Z. Kan, L. Navaravong, J. M. Shea, E. L. Pasiliao, and W. E. Dixon, "Graph Matching Based Formation Reconfiguration of Networked Agents with Connectivity Maintenance," *IEEE Transactions on Control of Network Systems*, Vol. 2, No. 1, pp. 24-35 (2015)
5. J. Klotz, Z. Kan, J. M. Shea, E. L. Pasiliao, and W. E. Dixon, "Asymptotic Synchronization of Leader-Follower Networks of Uncertain Euler-Lagrange Systems," *IEEE Transactions on Control of Network Systems*, Vol. 2, No. 2, pp. 174-182 (2015).
4. N. Fischer, Z. Kan, R. Kamalapurkar, and W. E. Dixon, "Saturated RISE Feedback Control for a Class of Second-Order Nonlinear Systems," *IEEE Transactions on Automatic Control*, Vol. 59, No. 4, pp. 1094-1099 (2014)
3. Z. Kan, A. P. Dani, J. M. Shea, and W. E. Dixon, "Network Connectivity Preserving Formation Stabilization and Obstacle Avoidance via A Decentralized Controller," *IEEE Transactions on Automatic Control*, Vol 57, No. 7, pp. 1827-1832 (2012).
2. L. Navaravong, Z. Kan, J. M. Shea, and W. E. Dixon, "Formation Reconfiguration for Mobile Robots with Network Connectivity Constraints," *IEEE Network*, Vol. 26, No. 4, pp. 18-24 (2012).
1. A. P. Dani, N. R. Fischer**,** Z. Kan, and W. E. Dixon, "Globally Exponentially stable observer for Vision-based Range Estimation," *Mechatronics, Special Issue on Visual Servoing*, Vol 22, No. 4, pp. 381-389 (2012).

Peer Reviewed Conference Papers

47. J. Li, S. Wang, Z. Chen, and Z. Kan, "Lightweight Neural Path Planning" *IEEE/RSJ International Conference on Intelligent Robots and Systems (IROS)*, 2023, to appear.
46. T. Qian, Z. Zhou, S. Wang, Z. Li, C. Su, and Z. Kan, "Vision-Based Reactive Planning and Control of Quadruped Robots in Unstructured Dynamic Environments" *IEEE International Conference on Advanced Robotics and Mechatronic*s, 2023, to appear.

45. Y. Xia, S. Wang, and Z. Kan "A Nested U-Structure for Instrument Segmentation in Robotic Surgery" *IEEE International Conference on Advanced Robotics and Mechatronics*, 2023, to appear.
44. Z. Chen, Z. Zhou, S. Wang, and Z. Kan, "A Hierarchical Decoupling Approach for Fast Temporal Logic Motion Planning," *IEEE International Conference on Robotics and Automation (ICRA)*, 2023, London, UK, to appear.
43. K. Chen, S. Wang, B. Xia, D. Li, Z. Kan, B. Li, "TODE-Trans: Transparent Object Depth Estimation with Transformer," *IEEE International Conference on Robotics and Automation (ICRA)*, 2023, London, UK, to appear.
42. C. Zhang, S. Wang, S. Meng, and Z. Kan, "Safe Exploration of Reinforcement Learning with Data-Driven Control Barrier Function," China Automation Congress, 2022, to appear.
41. S. Wang, Z. Zhou, H. Wang, Z. Li, and Z. Kan, "Unsupervised Representation Learning for Visual Robotics Grasping," *IEEE International Conference on Advanced Robotics and Mechatronics*, 2022, Guilin, China, pp. 57-62.
40. H. Wang, H. He, W. Shang, and Z. Kan, "Temporal Logic Guided Motion Primitives for Complex Manipulation Tasks with User Preferences," *IEEE International Conference on Robotics and Automation (ICRA)*, 2022, Philadelphia, PA, USA, pp. 4305-4311.
39. M. Cai, S. Xiao, B. Li, Z. Li, and Z. Kan, "Reinforcement Learning Based Temporal Logic Control with Maximum Probabilistic Satisfaction," *IEEE International Conference on Robotics and Automation* (ICRA), Xi'an, China, 2021, pp. 806-812.
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37. B. She, S. Meng, Z. Li, and Z. Kan, "Characterizing Energy-Related Controllability of Complex Networks Via Cartesian Product," *IEEE International Conference on Control and Automation*, Sapporo, Hokkaido, Japan, 2020, pp. 476-481.
36. S. S. Mehta, C. Ton, M. Rysz, P. Ganesh, Z. Kan, and T. Burks, "On Achieving Bounded Harvest Times in Robotic Fruit Harvesting: A Finite-Time Visual Servo Control Approch," *IFAC Conference on Sensing, Control and Automation Technologies for Agriculture, Sydney*, Australia, 2019, pp. 114-119
35. B. She, M. Cai, and Z. Kan, "Characterizing Herdability of Signed Networks via Graph Walks," *IEEE Conference on Decision and Control*, Nice, France, 2019, pp. 5456-5461.
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24. S. S. Mehta, C. Ton, M. McCourt, Z. Kan, E. A. Doucette, and J. W. Curtis, "Human-assisted RRT for Path Planning in Urban Environments," *IEEE International Conference on Systems, Man, and Cybernetics,* Hong Kong, 2015, pp. 941-946.
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22. M. McCourt, S. S. Mehta, Z. Kan, and J. W. Curtis, "Multiple CLFs for Stabilization of Nonlinear Systems with Input Constraints," *IEEE International Conference on Systems, Man, and Cybernetics*, Hong Kong, 2015, pp. 38-43.
21. T. Cheng, Z. Kan, J. Klotz, J. M. Shea, and W. E. Dixon, "Decentralized Event-triggered Control of Networked Systems Part 1: Leader-follower Consensus under Switching Topologies," *American Control Conference*, Chicago, Il, 2015, pp. 5438-5443.
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19. J. Klotz, S. Obuz, Z. Kan, and W. E. Dixon, "Synchronization of Uncertain Euler-Lagrange Systems with Unknown Time-Varying Communication Delays," *American Control Conference*, Chicago, Il, 2015, pp. 683-688.
18. T. Cheng, Z. Kan, J. M. Shea, and W. E. Dixon, "Decentralized Event-triggered Control for Leader-follower Consensus," *IEEE Conference on Decision and Control*, Los Angeles, CA, 2014, pp. 1244-1249.
17. Z. Kan, S. S. Mehta, E. L. Pasiliao, J. W. Curtis, and W. E. Dixon, "Balanced Containment Control and Cooperative Timing of a Multi-Agent System," *American Control Conference*, Portland, Oregon, 2014, pp. 281-286.
16. Teng-Hu Cheng, Z. Kan, Joel Rosenfeld, and W. E. Dixon, "Decentralized Formation Control with Connectivity Maintenance and Collision Avoidance under Limited and Intermittent Sensing," *American Control Conference*, Portland, Oregon, 2014, pp. 3201-3206.
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12. Z. Kan, J. M. Shea, and W. E. Dixon, "Influencing Emotional Behavior in a Social Network," *American Control Conference*, Montréal, Canada, 2012, pp. 4072-4077.
11. Z. Kan, Justin Klotz, Teng-Hu Cheng, and W. E. Dixon, "Ensuring Network Connectivity for Nonholonomic Robots During Decentralized Rendezvous," *American Control Conference*, Montréal, Canada, 2012, pp. 3718-3723.
10. N. Fischer, Z. Kan, and W. E. Dixon, "Saturated RISE Feedback Control for Euler-Lagrange Systems," *American Control Conference*, Montréal, Canada, 2012, pp. 244-249.
9. He Hao, Huibing Yin, and Z. Kan, "On the Robustness of Large 1-D Network of Double Integrator Agents," *American Control Conference*, Montréal, Canada, 2012, pp. 6059-6064.
8. Z. Kan, A. Dani, J. M. Shea, and W. E. Dixon, "Ensuring Network Connectivity for Nonholonomic robots During Rendezvous," *IEEE Conference on Decision and Control*, Orlando, FL, 2011, pp. 2369-2374.
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6. A. Dani, Z. Kan, N. Fischer, and W. E. Dixon, "Structure Estimation of a Moving Object Using a Moving Camera: An Unknown Input Observer Approach," *IEEE Conference on Decision and Control*, Orlando, FL, 2011, pp. 5005-5010.
5. Z. Kan, A. Dani, J. M. Shea, and W. E. Dixon, "Ensuring Network Connectivity During Formation Control Using A Decentralized Navigation Function," *Military Communications Conference (MILCOM)*, San Jose, CA, 2010, pp. 954-959.
4. Z. Kan, S. Subramanian, J. M. Shea, and W. E. Dixon, "Vision Based Connectivity Maintenance of a Network with Switching Topology," *IEEE International Symposium on Intelligent Control part of the Multi-Conference on Systems and Control*, Yokohama, Japan, September 2010, pp.1493-1498.
3. A. P. Dani, Z. Kan, N. R. Fischer and W. E. Dixon, "Structure and Motion Estimation of a Moving Object Using a Moving Camera," *American Control Conference*, Baltimore, Maryland, 2010, pp. 6962-6967.
2. A. P. Dani, N. R. Fischer, Z. Kan, and W. E. Dixon, "Nonlinear Observer for Structure Estimation using a Paracatadioptric Camera," *American Control Conference*, Baltimore, Maryland, 2010, pp. 3487-3492.
1. S. Bhasin, P. Patre, Z. Kan, and W. E. Dixon, "Control of a Robot Interacting with an Uncertain Viscoelastic Environment with Adjustable Force Bounds," *American Control Conference*, Baltimore, MD, 2010, pp. 5242-5247.

Media Exposure:

1. "Air Force research: How to use social media to control people like drones", *Ars Technica*, 2014, (Web link: http://arstechnica.com/information-technology/2014/07/air-force-research-how-to-use-social-media-to-control-people-like-drones/)

Professional Service

- **Professional Affiliation**:
  - Senior Member, The Institute for Electrical and Electronics Engineers (IEEE), 2010-present
  - Member, IEEE Control Systems Society
  - Member, IEEE Robotics and Automation Society
- **Technical Committee:**
  - Member, *Intelligent Control,* IEEE Control Systems Society, 2017-present
  - Member, *Nonlinear Systems and Control,* IEEE Control Systems Society, 2017-present
  - Member, *Networks and Communications,* IEEE Control Systems Society, 2017-present
- **Review Panel:**
  - Member, *National Science Foundation,* Panel review, 2018
- **Journal Editorships:**
  - Associate Editor, *IEEE Transactions on Neural Networks and Learning Systems, 2023-Present*
  - Associate Editor, *IEEE Transactions on Automatic Control*, 2020-present
  - Associate Editor, *Frontiers in Robotics and AI*, 2019-present
  - Guest Editor, *IEEE Transactions on Cybernetics,* Special Issue, 2020
- **Conference Editorships:**
  - Associate Editor, *Conference Editorial Board,* IEEE Control Systems Society, 2016-present
  - Associate Editor, IEEE Conference on Decision and Control (CDC), 2016-Present
  - Associate Editor, IEEE American Control Conference (ACC), 2016-Present
  - Associate Editor, IEEE International Conference on Robotics and Automation (ICRA), 2023-Present
  - Associate Editor, International Conference on Control, Automation, Robotics and Vision (ICARCV), 2018-present
  - Associate Editor, IEEE International Conference on Control & Automation (ICCA), 2020-present
  - Associate Editor, IEEE International Conference on Advanced Robotics and Mechatronics (ICARM), 2021-present
- **Conference Organizing Committee and Service:**

- Publication Chair, *Chinese Control Conference (CCC)*, 2022
- Session Co-chair, *IEEE Conference on Decision and Control (CDC),* 2019
- Session Co-chair, *American Control Conference (ACC),* 2018
- Session Chair, *IEEE International Conference on Systems, Man, and Cybernetics (SMC),* 2015

- **Conference Program Committee:**
  - Member, *International Conference on Robotics Systems and Vehicle Technology (RSVT),* 2018-present
  - Member, *International Conference on Control and Robots (ICCR),* 2018-present
  - Member, *Asia-Pacific Conference on Intelligent Robot Systems (ACIRS),* 2017-present
  - Member, *International Conference on Enterprise Architecture and Information Systems (EAIS),* 2016-present
  - Member, *International Conference on Cybernetics, Robotics and Control (ICCRC),* 2016-present

- **Publication Review:**
  - Textbook Proposal Reviewer for Springer UK
  - Textbook Proposal Reviewer for Elsevier
  - *Automatica;*
  - *IEEE Transaction on Automatic Control;*
  - *IEEE Transaction on Control of Network Systems;*
  - *IEEE Transaction on Human-Machine Systems;*
  - *IEEE Transactions on Cybernetics;*
  - *IEEE Transactions on Intelligent Transportation Systems;*
  - *IEEE/CAA Journal of Automatica Sinica;*
  - *ASME Journal of Dynamic Systems, Measurement, and Control*
  - *Asian Journal of Control*
  - *IET Control Theory & Applications*
  - *International Journal of Robust and Nonlinear Control;*
  - *Journal of the Franklin Institute;*
  - *International Journal of Control*
  - *Nonlinear Analysis: Hybrid Systems*
  - *Robotica*
  - *Sensor*

- **Reviewer for Conferences:**
  - *IEEE Conference on Decision and Control (CDC);*
  - *American Control Conference (ACC);*
  - *IEEE Multi-conference on Systems and Control (MSC);*
  - *IEEE International Conference on Robotics and Automation (ICRA)*
  - *IFAC World Congress*