Peng Yang

Name: Peng YANG Ph.D. Personal Phone: +86-15555129131 Email: yangp@sustech.edu.cn Information Distributed Evolutionary Computation, Intelligent Logistics. Research Interests EDUCATION University of Science and Technology of China, Hefei, China Ph.D., Computer Science, 09/2012 - 06/2017 Supervisors: Prof. Xin Yao and Prof. Ke Tang B.Eng., Computer Science, 09/2008 - 06/2012 RESEARCH Research Assistant Professor Feb. 2018 - present EXPERIENCE Department of Computer Science and Engineering, Southern University of Science and Technology, China Senior Engineer July 2017 - Jan. 2018 IT Algorithm Department, Huawei Technologies CO., LTD., China Visiting Student Oct 04th 2015 - Oct 24th 2015 National Institute of Informatics, Japan Host supervisor: Prof. Helmut Prendinger Became an alumnus of Sakura Science Plan launched by JST(Japan Science Technology Agency). Visiting Student July 2014 - Jan 2015 The Centre of Excellence for Research in Computational Intelligence and Applications (CERCIA), University of Birmingham, U.K. Host supervisor: Prof. Xin Yao Visiting Student Nov. 2013 - May 2014 The Intelligent Systems Group, University of Basque Country, Spain Host Supervisor: Prof. Jose A. Lozano AWARDS • Outstanding Doctoral Dissertation of CAAI (Nomination Award) 2018 • Special Prize of Presidential Scholarship of Chinese Academy of Sciences 2017• Excellent Graduate Student of Anhui Province 2017 • Excellent Graduate Student of University of Science and Technology of China 2017 • Guorui Scholarship 2016 • IEEE Computational Intelligence Society Outstanding Student Paper Travel Grants 2016 • Microsoft Research Asia Fellowship (Nomination Award) 2015 • USTC-Institute of Advanced Manufacturing Technology Scholarship 2015 • IEEE Computational Intelligence Society Graduate Student Research Grants 2015 • National Scholarship for Graduate Students 2014 Referred 1. Dongbin Jiao, Peng Yang, Liqun Fu, Liangjun Ke, and Ke Tang. Optimal Energy-Delay Scheduling Journal for Energy Harvesting WSNs with Interference Channel via Negatively Correlated Search. IEEE **Publications** Internet of Things Journal, Vol. 7, Issue 3, pp. 1690-1703, 2020. 2. Peng Yang, Ke Tang and Xin Yao. A Parallel Divide-and-Conquer based Evolutionary Algorithm for Large-scale Optimization. *IEEE Access*, vol. 7, pp. 163105-163118, 2019.

- 3. **Peng Yang**, Ke Tang and Xin Yao. Turning High-dimensional Optimization into Computationally Expensive Optimization. *IEEE Transactions on Evolutionary Computation*, Vol. 22, Issue 1, pp. 143-156, 2018.
- 4. Jinhong Zhong, **Peng Yang**, Ke Tang. A Quality-Sensitive Method for Learning from Crowds. *IEEE Transactions on Knowledge and Data Engineering*, Vol. 29, Issue 12, pp. 2643-2654, 2017.
- 5. Ke Tang, **Peng Yang** and Xin Yao. Negatively Correlated Search. *IEEE Journal on Selected Areas in Communications*, Vol. 34, Issue 3, pp. 1-9, March 2016.

- Peng Yang, Ke Tang, Jose A. Lozano and Xianbin Cao. Path Planning for Single Unmanned Aerial Vehicle by Separately Evolving Waypoints. *IEEE Transactions on Robotics*, Vol. 31, Issue 5, pp. 1130-1146, 2015.
- 7. **Peng Yang**, Ke Tang and Xiaofen Lu. Improving Estimation of Distribution Algorithm on Multimodal Problems by Detecting Promising Areas. *IEEE Transactions on Cybernetics*, Vol. 45, Issue 8, pp. 1438-1449, 2015.

REFERRED CONFERENCE PUBLICATIONS

- 1. Yunwen Lei, **Peng Yang**, and Ke Tang. Optimal Stochastic and Online Learning with Individual Iterates. In: *Proceedings of Conference and Workshop on Neural Information Processing Systems (NeurIPS 2019)*, Vancouver, Canada; 12/2019.
- 2. Er Zhuo, Yunjie Deng, Zhewei Su, **Peng Yang**, Bo Yuan, and Xin Yao. An Experimental Study of Large-scale Capacitated Vehicle Routing Problems. In: *Proceedings of the 2019 IEEE Congress on Evolutionary Computation (IEEE CEC 2019)*, Wellington, New Zealand; 06/2019.
- 3. Dongbing Jiao, **Peng Yang**, Liqun Fu, Liangjun Ke, and Ke Tang. Optimal Energy-Delay Scheduling for Energy Harvesting WSNs via Negatively Correlated Search. In: *Proceedings of the 2019 International Conference on Communications (ICC 2019)*, Shanghai, China; 07/2019.
- 4. Dongjun Qian, **Peng Yang*** and Ke Tang. A Fast Heuristic Path Computation Algorithm for Batch Bandwidth Constrained Routing Problem in SDN. In: *Proceedings of the 15th Pacific Rim International Conference on Artificial Intelligence (PRICAI 2018)*, pp. 490-502, Nanjing, China; 08/2018, Springer.
- 5. Peng Yang, Guanzhou Lu, Ke Tang and Xin Yao. A Multi-Modal Optimization Approach to Single Path Planning for Unmanned Aerial Vehicle. In: *Proceedings of the 2016 IEEE Congress on Evolutionary Computation (CEC 2016)*, pp.1735-1742, Vancouver, Canada; 07/2016, IEEE.
- 6. **Peng Yang**, Ke Tang, Lingxi Li and Kai Qin. Evolutionary Robust Optimization with Multiple Solutions. In: *Proceedings of The 18th Asia Pacific Symposium on Intelligent and Evolutionary Systems (IES 2015)*, Nov., 2015, Singapore; pp.611-625, Springer.
- 7. Wenjing Hong, Guanzhou Lu, **Peng Yang**, Yong Wang and Ke Tang. A New Evolutionary Multiobjective Algorithm for Convex Hull Maximization. In: *Proceedings of the 2015 IEEE Congress* on Evolutionary Computation (CEC 2015), pp.931-938, Sendai, Japan; 05/2015, IEEE.
- 8. **Peng Yang**, Ke Tang and Jose A. Lozano. Estimation of Distribution Algorithms based Unmanned Aerial Vehicle Path Planner Using a New Coordinate System. In: *Proceedings of the 2014 IEEE Congress on Evolutionary Computation (CEC 2014)*, pp.1469-1476, Beijing, China; 07/2014, IEEE.

Professional Services

Special Session Organizer

• Co-chair of Special Session on "Evolutionary Optimization: Foundations and Its applications to Intelligent Data Analytics" at ICIC'18.

Invited Talks

- "Large-scale Distributed Evolutionary Computational Engine", Huawei Technologies CO., LTD., Shenzhen, China; 09/2019.
- "Large-scale Distributed Evolutionary Computation", the 6th Chinese Workshop on Evolutionary Computation and Learning (ECOLE'2019), Xiangtan, China; 05/2019.
- "Turning High-dimensional Optimization into Computationally Expensive Optimization", the 15th Pacific Rim International Conference on Artificial Intelligence (PRICAI'2018), Nanjing, China; 08/2018.

Journal Reviewer

- IEEE Transactions on Evolutionary Computation
- IEEE Transactions on Industrial Electronics
- IEEE Transactions on Emerging Topics in Computational Intelligence
- Information Sciences
- IEEE Access
- Applied Soft Computing
- Frontiers of Computer Science
- Computers & Operations Research
- Memetic Computing

- Natural Computing
- SCIENCE CHINA Information Sciences
- Swarm and Evolutionary Computation
- Journal of Systemics, Cybernetics, and Informatics

Conference PC member

- The International Conference on Machine Learning (ICML'20)
- The Association for the Advancement of Artificial Intelligence (AAAI'19, AAAI'20)
- The International Joint Conferences on Artificial Intelligence (IJCAI'18, IJCAI'19, IJCAI'20)
- The IEEE Congress on Evolutionary Computation (IEEE CEC'19, CEC'20)
- The International Conference on Simulated Evolution and Learning (SEAL'17)
- The IEEE Symposium Series on Computational Intelligence (SSCI'16)
- The World Multi-Conference on Systemics, Cybernetics And Informatics (WMSCI'15, WMSCI'18)