JIAJUN LI

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Institute of Computing Technology, Chinese Academy of Sciences No.6 Kexueyuan South Road Zhongguancun, Haidian District Beijing, China

EDUCATION

University of Chinese Academy of Sciences Aug. 2016 - Present Ph.D. student in Institute of Computing Technology, Chinese Academy of Sciences under supervision of Professor Yinhe Han and Professor Xiaowei Li China University of Geosciences (Wuhan) Aug. 2012 - Jun. 2016 Talent Program of Li Siguang (30/4000+), GPA: 4.05, Rank: 2/44 SELECTED PROJECTS Ultra Low-Power Neural Accelerators of Keyword Spotting Sep. 2017 - Present • Research a method to effectively train binarized neural networks for the specialized low-precision neural accelerators. • First authored and published a paper in ASP-DAC'19. Robo-Advisor of Investment Mar. 2016 - Aug. 2017 • Based on A-SHARE, research and develop a core algorithm for a platform of robo-advisor of investment. Low-Power Image Recognition Challenge 2016 Aug. 2015 - Jun. 2016 • Survey how to use Convolutional Neural Networks to hypothesize object location and categorization from images in mobile heterogeneous SoCs. • Won first prize in Track 1, second prize in Track 1, first prize in Track 3. • Co-authored a paper in ASP-DAC'17. Mar. 2014 - Nov. 2014 Algorithm of wheeled robot motion planning • Research and develop a algorithm of wheeled robot motion planning based on the simulation platform of FIRA SimuroSot 5:5. • Won two international awards and a national award. Higher Education Teaching Research Project of Hubei Province Sep. 2013 - Dec. 2013 • Study a method for judging the convergence and divergence of series.

• First authored and published A Method of Testing the Convergence of Series. in Studies in College Mathematics.

PUBLICATIONS

Haobo Xu, Ying Wang, Yujie Wang, Jiajun Li, Bosheng Liu and Yinhe Han. ACG-Engine: An Inference Accelerator for Content Generative Neural Networks. In IEEE/ACM Proceedings of 2019 International Conference On Computer Aided Design (ICCAD'19).

Bosheng Liu, Xiaoming Chen, Yinhe Han, Jiajun Li, Haobo Xu, and Xiaowei Li. Accelerating Scene Understanding of 3D Point Cloud Data for Mobile Robotics. SCIENCE CHINA Information Sciences, 2019.

Cong Shi, Jiajun Li, Ying Wang, and Gang Luo. Exploiting Lightweight Statistical Learning for Event-Based Vision Processing. *IEEE Acess*, 2018.

Jiajun Li, Ying Wang, Bosheng Liu, Yinhe Han, and Xiaowei Li. Simulate-the-hardware: Training Accurate Binarized Neural Networks for Low-Precision Neural Accelerators. *In IEEE/ACM Proceedings of 24th Asia and South Pacific Design Automation Conference* (ASP-DAC'19).

Bosheng Liu, Xiaoming Chen, Ying Wang, Yinhe Han, **Jiajun Li**, Haobo Xu, and Xiaowei Li. Addressing the Issue of Processing Element Under-Utilization in General-Purpose Systolic Deep Learning Accelerators. *IEEE/ACM Proceedings of 24th Asia and South Pacific Design Automation Conference* (ASP-DAC'19).

Jiajun Li, Ying Wang, Yinhe Han, and Xiaowei Li. Training Effective Binarized Neural Networks for Intelligent Edge Devices Neural Network Accelerator. *In Proceedings of 2018 Chinese Testing Conference* (CTC'18).

Ying Wang, Zhenyu Quan, **Jiajun Li**, Yinhe Han, Huawei Li, and Xiaowei Li. A Retrospective Evaluation of Energy-Efficient Object Detection Solutions for Embedded Devices. *In IEEE/ACM Proceedings of 2018 Design, Automation and Test in Europe conference* (DATE'18).

Cheng Wang, Ying Wang, Yinhe Han, Lili Song, Zhenyu Quan, **Jiajun Li**, and Xiaowei Li. CNN-based object detection solutions for embedded heterogeneous multi-core SoCs. *In IEEE/ACM Proceedings of 22nd Asia and South Pacific Design Automation Conference* (ASP-DAC'17).

LEADERSHIP

Co-President of Students' Career Development Association of ICT Institute of Computing Technology, Chinese Academy of Sciences Planning and arranging more than 10 meetings and conferences.	Aug. 2017 - Sep. 2018
Co-President of Graduate Badminton Association University of Chinese Academy of Sciences Founding and Leading one of the largest clubs on campus.	Sep. 2016 - Jun. 2017
Team Leader of Student's Platform for Innovation and Entrepreneurs Ministry of Education of the People's Republic of China Satellite data and ground data fusion for detection of PM2.5.	May. 2014 - Apr. 2016

SELECTED HONORS & AWARDS

ELECTED HONORS & AWARDS		
	Merit Student of Chinese Academy of Sciences (three consecutive years) University of Chinese Academy of Sciences	Jul. 2017 - Jun. 2019
	Outstanding B.E. Degree Thesis of Hubei Province, China Hubei Provincial Department of Education	Jan. 2017
	Chinese Academy of Sciences Scholarship Ministry of Education of the People's Republic of China and Chinese Academy of Sciences	Dec. 2016
	Low-Power Image Recognition Challenge 2016 (1st Place) IEEE Rebooting Computing	May. 2016
	National Scholarship Ministry of Education of the People's Republic of China	Nov. 2014
	19th FIRA RoboWorld Cup 2014 (2nd Place) the Federation of International Robot-soccer Association	Nov. 2014
	Academician Scholarship China University of Geosciences (Wuhan)	Dec. 2013
	Badminton Championship of Capital Universities (2nd Place) Federation of University Sports of Beijing	Apr. 2017