Yiguo Qiao

Curriculum Vitae

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Work Experience

2019-now Research Associate, Department of Computer Science, University of Bath, England.

Education

2011-2018 **Ph.D. at Xidian University**, School of Artificial Intelligence, Xi'an, China.

Doctor of Philosophy in Circuits and Systems

Dissertation: Depth Super-resolution and Virtual View Synthesis in 3D Stereoscopic Vision

Advisors: Prof. Licheng Jiao (Fellow, IEEE) and Prof. Jin Pan

Master's degree at Xidian University, Key Laboratory of Intelligent Perception 2010-2011 and Image Understanding of Ministry of Education, Xi'an, China.

Master of Science in Pattern Recognition and Intelligent Systems

Advisors: Prof. Licheng Jiao (Fellow, IEEE) and Prof. Jin Pan

Bachelor's degree at Xidian University, School of Electronic Engineering, Xi'an, 2006-2010

Bachelor of Science in Automation

Dissertation: Research and Development of Integrated System of ERP and MES

Research Experience

2021-now Research on Unsupervised Motion Retargetting in Motion Capture, Researcher, University of Bath and Trinity College Dublin.

Development of Rheumatoid Arthritis Flare Profiler, Researcher, University of Bath, 2019-2021 healthtech company Living With, and Royal United Hospitals Bath NHS Foundation Trust (RUH).

2013-2016 Research on Elimination of Coding Effect and High Quality Binocular View Generation in 3DTV, Co-Investigator, Xidian University.

2012-2013 Technologies of Video Processing in 3DTV, Co-Investigator, Xidian University and Huawei Technologies Co. Ltd.

Publications

Peer-reviewed publications

2021 Donal Egan, George Fletcher, Yiguo Qiao, Darren Cosker and Rachel McDonnell, How to Train Your Dog: Neural Enhancement of Quadruped Animations, ACM SIGGRAPH Conference on Motion, Interaction and Games (MIG), 2021, accepted.

- **Yiguo Qiao**, Licheng Jiao, Wenbin Li, Christian Richardt and Darren Cosker, *Fast, High-quality Hierarchical Depth-map Super-resolution*, ACM International Conference on Multimedia (ACM MM), 2021, accepted. (*Full paper*).
- 2020 **Yiguo Qiao**, Licheng Jiao, Xu Tang, Wenbin Li and Darren Cosker, *High-quality Depth Up-sampling via A Supervised Classification Guided MRF Model*, Pattern Recognition Letters.
- Yiguo Qiao, Licheng Jiao, Shuyuan Yang, Biao Hou and Jie Feng, Color Correction and Depth-Based Hierarchical Hole Filling in Free Viewpoint Generation, IEEE Transactions on Broadcasting.
- 2018 **Yiguo Qiao**, Licheng Jiao, Shuyuan Yang and Biao Hou, *A Novel Segmentation Based Depth Map Up-sampling*, IEEE Transactions on Multimedia.
 - **Yiguo Qiao**, Licheng Jiao and Biao Hou, *High-quality Depth Up-sampling Based on Multi-scale SLIC*, Electronics Letters.
- Yiguo Qiao and Cheolkon Jung, *Dictionary Based Hole Filling with Assistance of Depth*, Proc. IEEE Intl. Conf. on Multimedia and Expo (ICME), 2014. (Full paper).

Papers in progress

- 1. Anonymous Author(s), The relationship between grip strength and RAPID3 (Routine Assessment of Patient Index Data 3) in patients with rheumatoid arthritis and short-term prediction of disease condition using LSTM (Long Short Term Memory) network.
- 2. Anonymous Author(s), Joint segmentation on thermal image and relationship analysis between hand temperature and RAPID3 for follow-up of Rheumatoid Arthritis.

Patents

- 1. L. Jiao, **Y. Qiao**, et al., *A Color Correction based Free Viewpoint Generation Method*, China, 201610334492.7[P], authorized in 2018-03-13.
- C. Jung, L. Jiao, F. Xue, T. Sun, Y. Qiao, A Parallax Minimal Perceptible Model based Stereo Video Coding Method, China, 201410240167.5[P], authorized in 2018-05-22.
- 3. L. Jiao, **Y. Qiao**, et al., *A minimum joint distance based depth map up-sampling method*, China, 201610334077.1[P], authorized in 2019-04-23.

Technical Skills

Programming Python, MATLAB, HTML, css, C/C++

Others LaTeX, Lyx, TeXworks, SPSS, Blender, Unity, Docker, Microsoft Office Tools, Mendeley

Languages

Chinese (native), English (intermediate)

Leisure and Entertainment

Singing, Playing Ukulele and Piano, Photography, Traveling, etc.