Heng Guo

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Homepage

Education

University of Electronic Science and Technology of China (UESTC) — Chengdu, China
Bachelor of Electronic Engineer — *Aug. 2015 – Sep. 2011*

University of Electronic Science and Technology of China (UESTC) — Chengdu, China
Master of Signal Processing — *Aug. 2018 – Sep. 2015*

Osaka University — Osaka, Japan
Doctor of Computer Science — *Apr. 2022 – Sep. 2018*

Experience

Specially Appointed Assistant Professor — May. 2022 – Present
Osaka University — *Osaka, Japan*

Research Assistant — Oct. 2018 – Apr. 2022
Osaka University — *Osaka, Japan*

Research Intern — Aug. 2021 – Oct. 2021
OPPO *Japan Research Center.* — *Yokohama, Japan*

Research Intern — June 2016 – Jan. 2017
AI lab of Qihoo 360 Technology Co. Ltd. — *Beijing, China*

Honors

Excellent Master Thesis of UESTC (Top 3%)	June 2018
Excellent Postgraduate of UESTC (Top 6%))	June 2018
National Scholarship of China(Top 2%))	Oct. 2017
Academic Scholarship of UESTC (Top 10%)	2015 & 2016 & 2017
Excellent Graduate of UESTC (Top 7%)	Sep. 2015
The 1st Prize of National College Student Information Security Contest	July 2014
The 2nd Prize of National Undergraduate Electronics Design Contest	Sep. 2013
People's Scholarship (Top 15%)	2011 & 2012 & 2013

Publication

[1] Guo Heng, et al. "Multispectral Photometric Stereo for Spatially-Varying Spectral Reflectances" International Journal of Computer Vision. (**IJCV 2022**).

[2] Guo Heng, et al. "Patch-based uncalibrated photometric stereo under natural illumination" IEEE Transactions on Pattern Analysis and Machine Intelligence. (**TPAMI 2021**).

[3] Guo Heng, et al. "Multispectral Photometric Stereo for Spatially-Varying Spectral Reflectances: A well posed problem?" IEEE Conference on Computer Vision and Pattern Recognition. (**CVPR 2021**).

[4] Guo Heng, et al. "Self-calibrating Near-light Photometric Stereo under Anisotropic Light Emission." Meeting on Image Recognition and Understanding (**MIRU 2020 Best student paper**).

[5] Guo Heng, et al. "Joint video stitching and stabilization from moving cameras." IEEE Transactions on Image Processing (**TIP 2016**).

[6] Guo Heng, et al. "View-consistent meshflow for stereoscopic video stabilization." IEEE Transactions on Computational Imaging (**TCI 2018**).

[7] Guo Heng, et al. "Joint bundled camera paths for stereoscopic video stabilization." IEEE International Conference on Image Processing (**ICIP 2016 Oral**).

[8] Guo Heng, et al. “Edge-preserving Near-light Photometric Stereo with Neural Surfaces.” arXiv preprint arXiv:2207.04622 (2022).

[9] Guo Heng, et al. “Neural DP simulator: Synthesizing Photorealistic Dual-pixel Images with Neural Point Spread Functions.” (CVPR 2023 under review).

[10] Guo Heng, et al. “NeuralMPS: Multispectral Photometric Stereo for Non-lambertian Spectral Reflectance.” arXiv preprint arXiv:2211.15311 (2022).

Professional Services

- Conference Reviewer: CVPR, ECCV, ACCV, ICIG
- Journal Reviewer: IEEE Transactions on Pattern Analysis and Machine Intelligence