Lecture 24-2-Image super-resolution

Yuyao Zhang, Xiran Cai PhD

zhangyy8@shanghaitech.edu.cn caixr@shanghaitech.edu.cn

SIST Building 2 302-F/302-C

Course piazza link：piazza.com/shanghaitech.edu.cn/spring2021/cs270spring2021

Image super-resolution

Image Super Resolution Based on Wavelet Domain

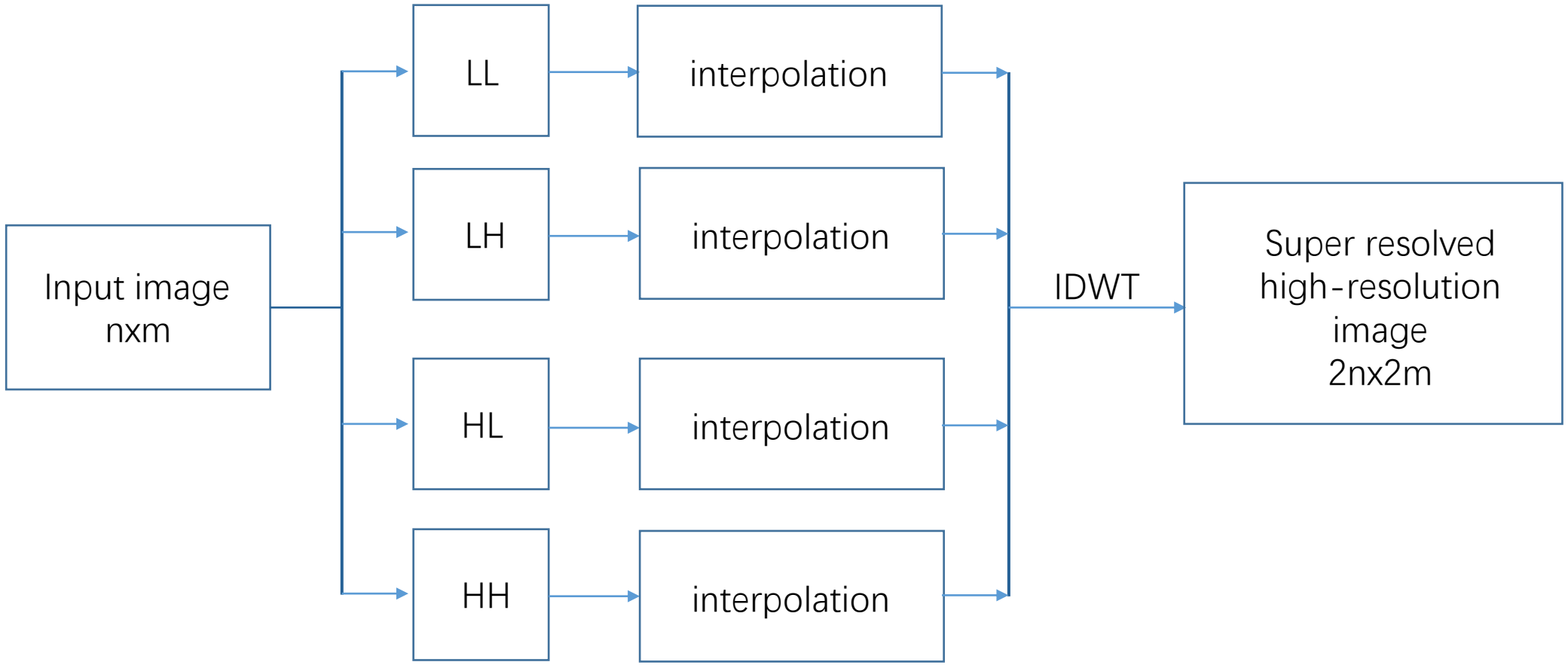
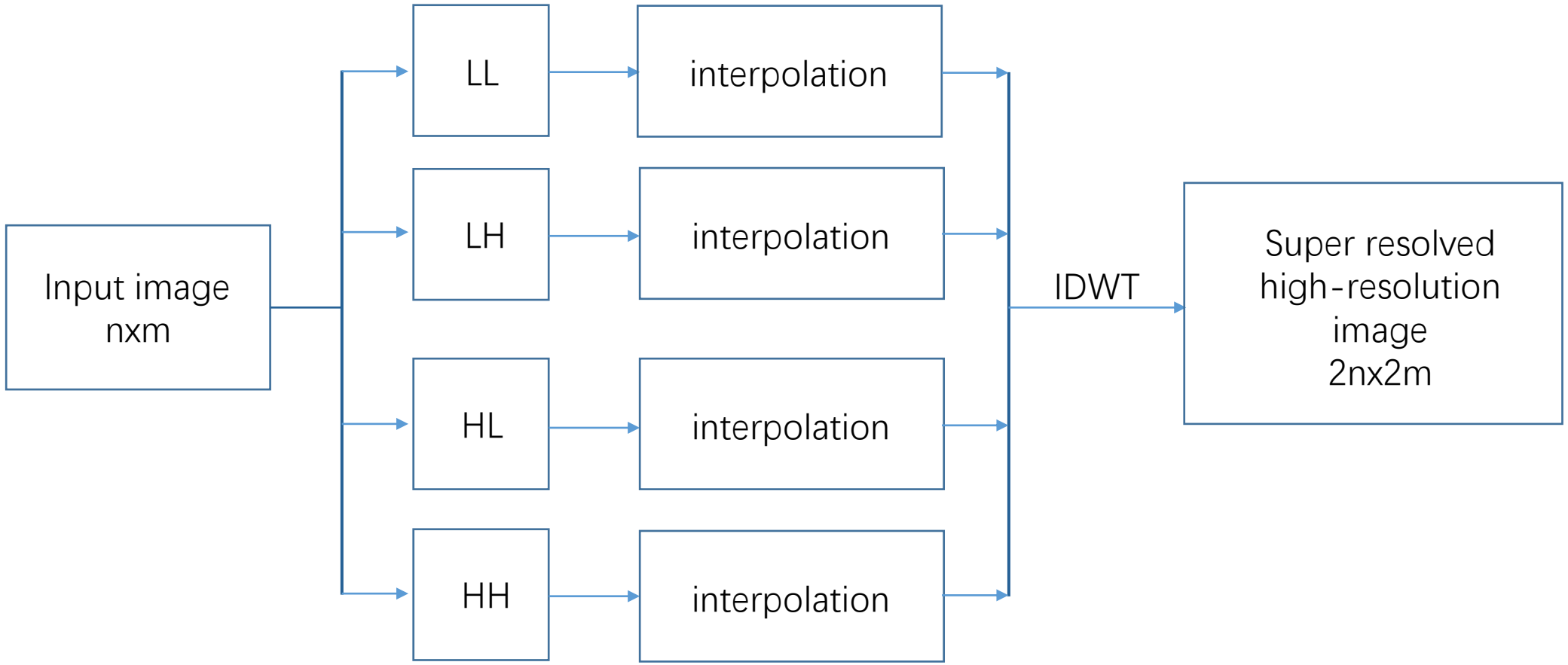


Image Super Resolution Based on Wavelet Domain



Result comparison

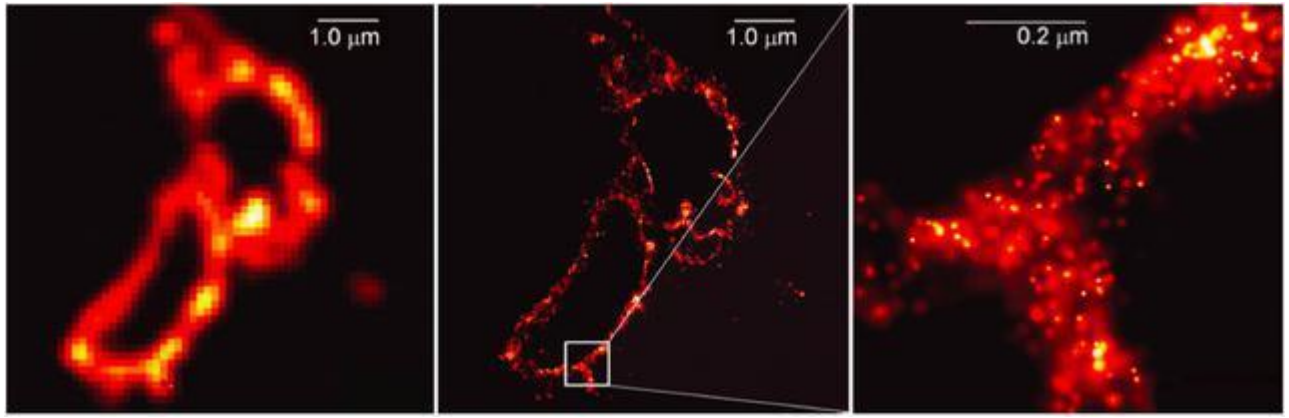
Take home massage

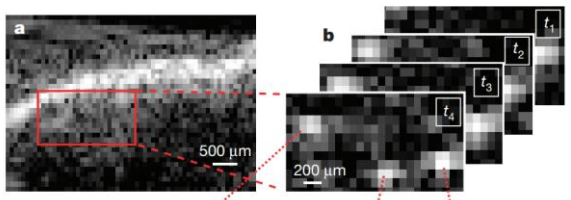
- Image high frequency domain is able to preserve/reconstruct image details.

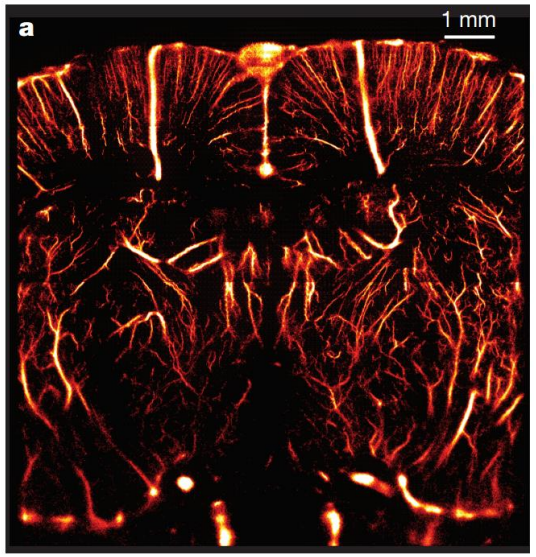
Super-resolution imaging in other fields

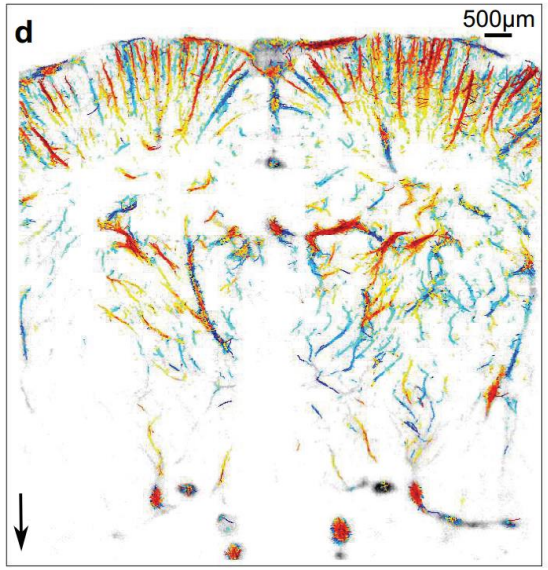
- Break the diffraction limit

Betzig 2006 Science

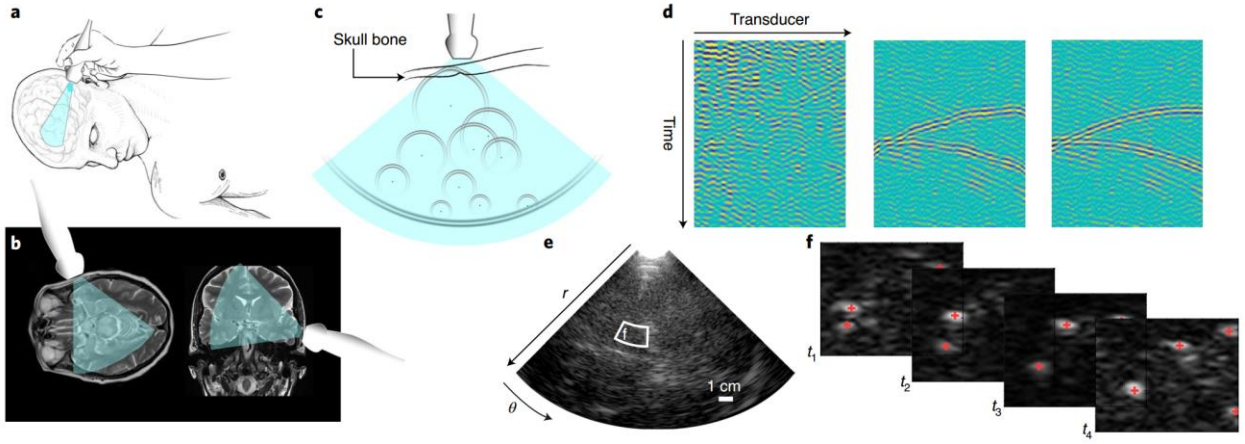


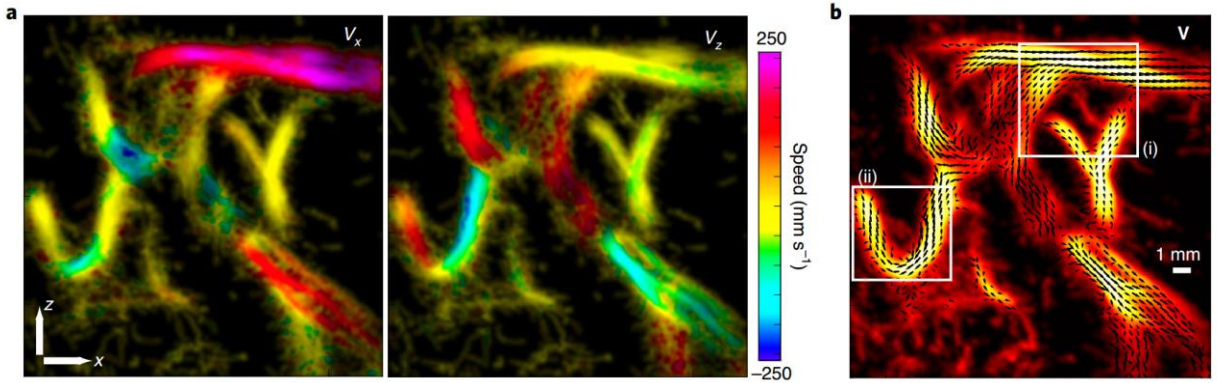






Errico 2015 Nature





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Deep Transcranial Adaptive Ultrasound Localization Microscopy of the human brain vascularization

Charlie Demené*[1], J. Robin*[1], A. Dizeux[1], B. Heiles[1], M. Pernot[1], M.Tanter*[1], F. Perren*[2]

[1]Physics for Medicine Paris, Inserm, ESPCI Paris, PSL University, CNRS
[2]Clinical Neuroscience Department, LUNIC, Université de Genève, Hôpitaux Universitaires de Genève, Switzerland

*CD and JR contributed equally to this work.
*MT and FP contributed equally to this work.

Corresponding author : Mickael Tanter, mickael.tanter@gmail.com

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