An Image Sensor/Processor 3D Stacked Module featuring ThruChip Interfaces

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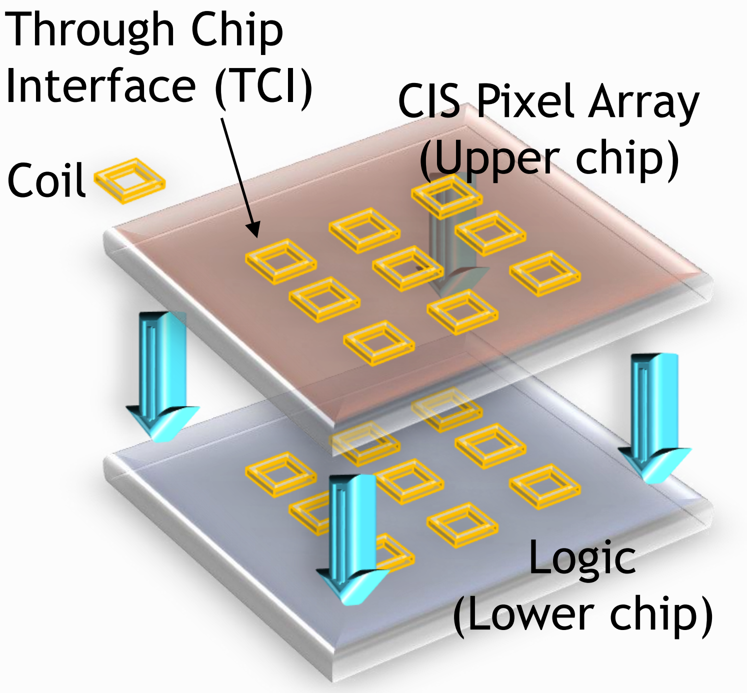
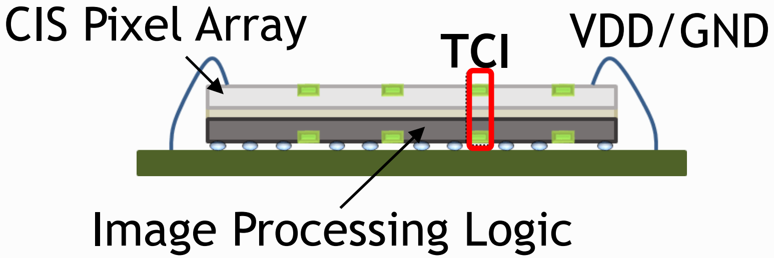
M. Ikebe[1], T. Asai[1], M. Mori[1], T. Itou[1] ,D. Uchida[1], Y. Take[2], T. Kuroda[2], and M. Motomura[1]
[1] Hokkaido University, [2] Keio University

Motivation for 3D-Stacked Imager with TCI



Development target

- Energy efficient
- Easy stacking
- High bandwidth



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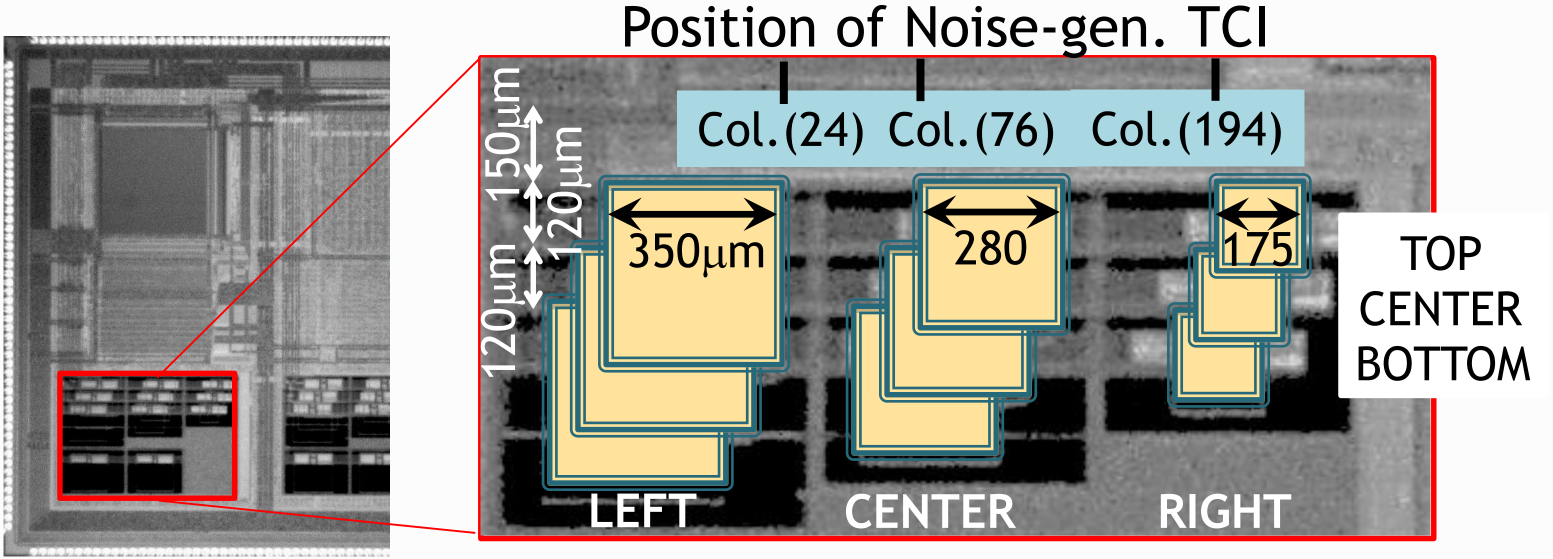
TCI Noise Evaluation



Main board
(for in-plain noise eval.)

Sub board
(for on-stack noise eval.)

Image Transfer thr. TCI (Normal Setup)

TCI Tx as Noise Gen. (Artificial Setup)

Two boards for noise evaluation

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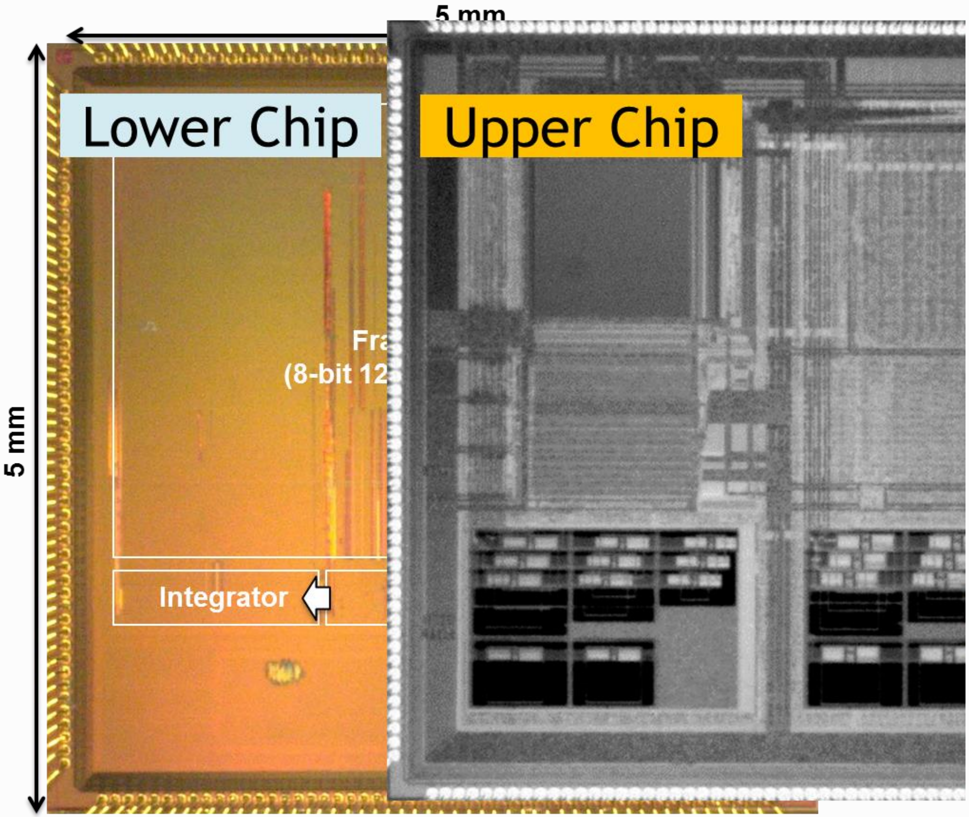
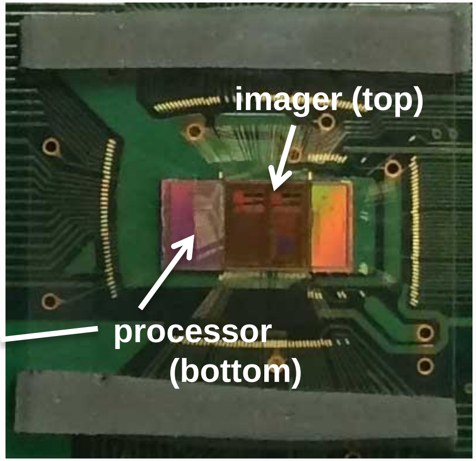
3-D stacked imager for Motion Estimation/Classification





3-D stacked Imager

Motion Estimation/Classification 3-D module

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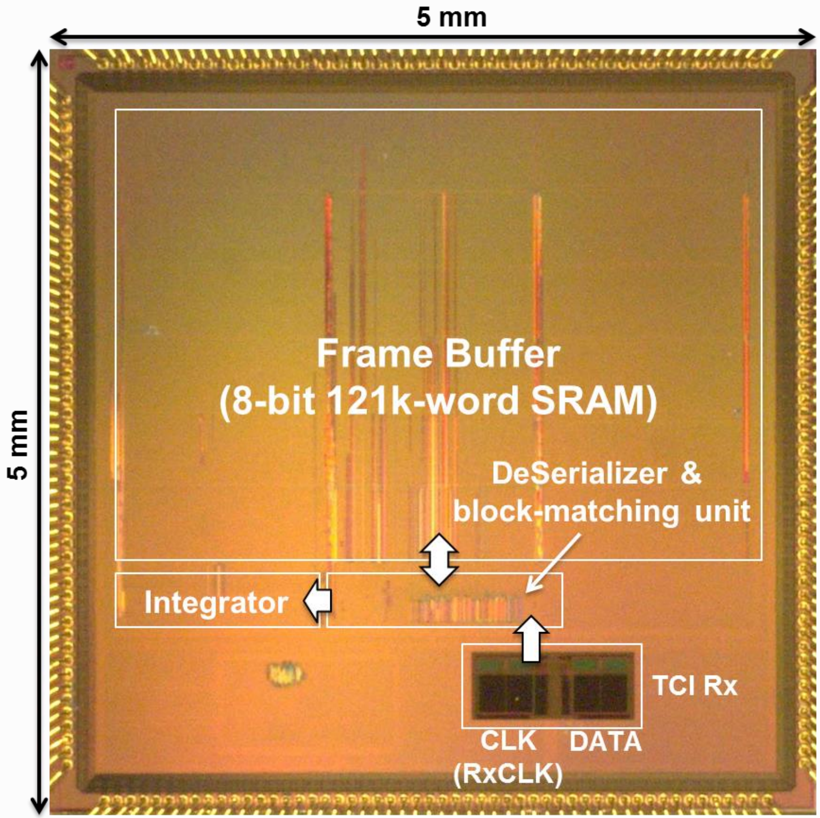
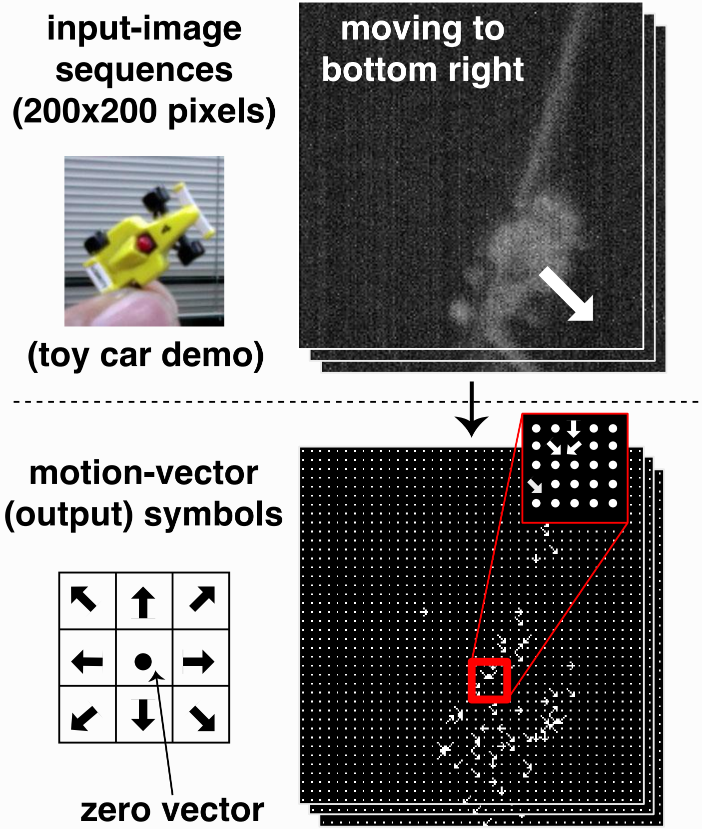
3-D stacked imager for Motion Estimation/Classification





Measured motion estimation

Please come to see our poster No.1S-2.