

LIVE IMAGING OF THE WHOLE MOUSE EMBRYO

Takehiko Ichikawa¹, Philipp J. Keller², Ernst H.K. Stelzer², Shigenori Nonaka¹

¹National Institute for Basic Biology,

Nishigonaka 38, Myodaiji, Okazaki Aichi, Japan

²European Molecular Biology Laboratory,

Meyerhofstrasse 1, D-69117 Heidelberg, Germany

Email: ichi@nibb.ac.jp

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ABSTRACT

Digital Scanned Light-sheet Microscope (DSLM) is a powerful tool for developmental biology. By using this microscopy, we can take following advantages. 1) It can image deep region of specimens 2) It can minimize photobleaching and phototoxicity. 3) It can take image relatively fast. [1, 2]

We have built a set of DSLM with culture system and image processing system, and started single cell visualization of whole mouse embryos at 5.5 – 6.5 days. Although long-term observation is still difficult, from preliminary data I could find interkinetic nuclear migration (INM) in epiblast. This is the first INM observation in epiblast. This time I show the whole mouse embryo imaging at E5.5 and 6.5 and suggest the model of the starting INM.

REFERENCES;

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