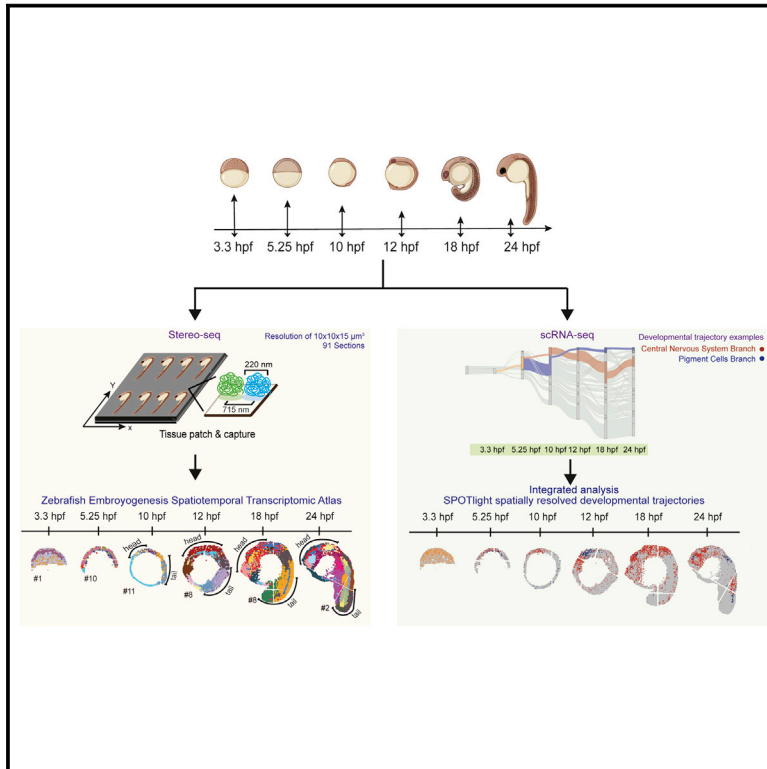


Developmental Cell

Spatiotemporal mapping of gene expression landscapes and developmental trajectories during zebrafish embryogenesis

Graphical abstract



Authors

Chang Liu, Rui Li, Young Li, ..., Xun Xu, Zhiqiang Dong, Longqi Liu

Correspondence

xuxun@genomics.cn (X.X.),
dongz@mail.hzau.edu.cn (Z.D.),
liulongqi@genomics.cn (L.L.)

In brief

Liu et al. employ Stereo-seq to dissect the spatiotemporal transcriptomic dynamics in developing zebrafish embryos. This study provides a spatially resolved resource for the research of vertebrate embryogenesis and also helps to uncover how molecular and cellular interactions contribute to zebrafish embryogenesis.

Highlights

- Stereo-seq is used to generate a ZESTA
- Co-varying spatial gene modules reveal the interactions between functional regions
- Integration of Stereo-seq and scRNA-seq builds spatial developmental trajectories
- Spatiotemporal ligand-receptor dynamics provides insights to regulatory mechanisms



Liu et al., 2022, *Developmental Cell* 57, 1284–1298
May 23, 2022 © 2022 The Authors. Published by Elsevier Inc.
<https://doi.org/10.1016/j.devcel.2022.04.009>