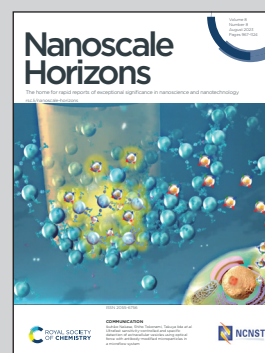


Showcasing research from Professor Takayama's laboratory, The Wallace H. Coulter Department of Biomedical Engineering, Georgia Institute of Technology and Emory University, USA.

Super-resolution imaging of linearized chromatin in tunable nanochannels

Strain-induced cracking of nano-thin elastomer films gives rise to nanochannels, which can linearize native chromatin fibers for multi-color super-resolution imaging *via* "blinking" microscopy. The channels, fabricated through fracture, are stretched wide to facilitate chromatin loading and then released to revert to their normally closed state, immobilizing the chromatin. By labeling this confined chromatin with self-blinking dyes, single molecule localization enables super-resolution chromatin mapping. In our initial application, we track histone inheritance from mother to daughter chromatin.

As featured in:



See Yifan Liu, Shuichi Takayama *et al.*, *Nanoscale Horiz.*, 2023, **8**, 1043.