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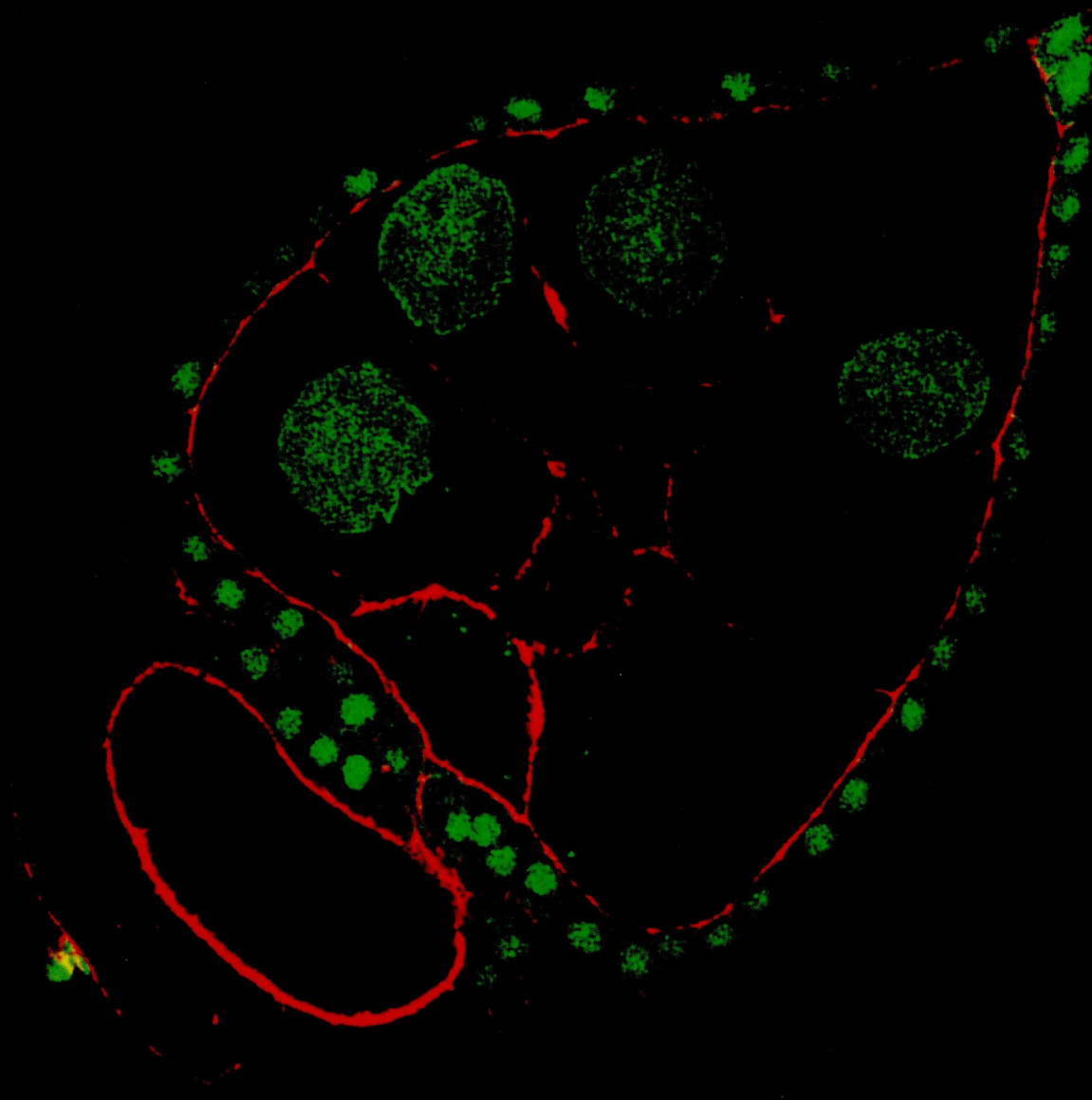
THE JOURNAL OF CELL BIOLOGY

VOL. 200, NO. 6, MARCH 18, 2013

Exploring Proteome
Plasticity

CUL4B Grants
License to Replicate

Oncogene-Induced
Replication Stress



Misshapen Gets Egg Chambers Rolling

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- CUL4B keeps replication firing on all cylinders
B. Short

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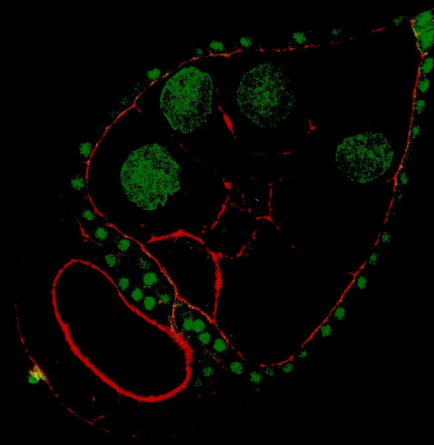
- Pericentric chromatin loops function as a nonlinear spring in mitotic force balance
Andrew D. Stephens, Rachel A. Haggerty, Paula A. Vasquez, Leandra Vicci, Chloe E. Snider, Fu Shi, Cory Quammen, Christopher Mullins, Julian Haase, Russell M. Taylor II, Jolien S. Verdaasdonk, Michael R. Falvo, Yuan Jin, M. Gregory Forest, and Kerry Bloom

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On the cover

Lewellyn et al. describe how the protein kinase Misshapen decreases integrin levels to promote the migration of follicle cells during *Drosophila* egg chamber morphogenesis. In an egg chamber stained for cortical actin (red), wild-type follicle cells (marked with GFP, green) break away from a group of immotile, Misshapen-null cells and bisect the oocyte by invading the inner germ cell cluster. Image © 2013 Lewellyn et al.

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MISP is a novel Plk1 substrate required for proper spindle orientation and mitotic progression

Mei Zhu, Florian Settele, Sachin Kotak, Luis Sanchez-Pulido, Lena Ehret, Chris P. Ponting, Pierre Gönczy, and Ingrid Hoffmann

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Bidirectional Ca^{2+} signaling occurs between the endoplasmic reticulum and acidic organelles

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A novel single-cell screening platform reveals proteome plasticity during yeast stress responses

Michal Breker, Melissa Gymrek, and Maya Schuldiner

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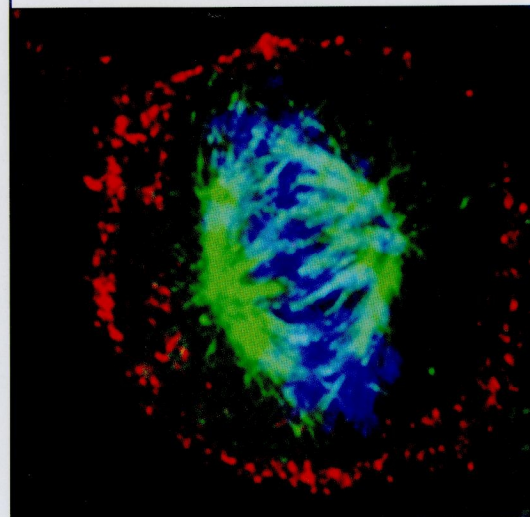
Akt regulates L-type Ca^{2+} channel activity by modulating $\text{Ca}_v\alpha 1$ protein stability

Daniele Catalucci, Deng-Hong Zhang, Jaime DeSantiago, Franck Aimond, Guillaume Barbara, Jean Chemin, Désiré Bonci, Eckard Picht, Francesca Rusconi, Nancy D. Dalton, Kirk L. Peterson, Sylvain Richard, Donald M. Bers, Joan Heller Brown, and Gianluigi Condorelli

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Drosophila PATJ supports adherens junction stability by modulating Myosin light chain activity

Arnab Sen, Zsanett Nagy-Zsvér-Vadas, and Michael P. Krahn



Zhu et al. identify MISP (red), an actin-associated protein that stabilizes the attachment of astral microtubules (green) to the cell cortex, thereby promoting mitotic spindle positioning.

Image © 2013 Zhu et al.

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