



## **Drosophila embryos allocate lipid droplets to specific lineages to ensure punctual development and redox homeostasis**

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### **Asymmetric nutrient body inheritance in embryonic lineages**

Embryos from diverse animal species allocate their maternally inherited nutrient stores to distinct cell lineages. Here a 4-cell stage mud snail (*Tritia obsoleta*) embryo displays dramatic asymmetries in the distribution of nutrient storage structure. The single large cell occupying the vegetal pole receives an abundance of yolk protein storage vesicles (magenta). The trio of cells occupying the animal pole receive all of the lipid droplets (green) and smaller quantities of yolk protein storage vesicles. This image was acquired on a spinning disc confocal microscope and represents a maximum intensity projection of a z stack. Image credit: M.D. Kilwein and T.K. Dao