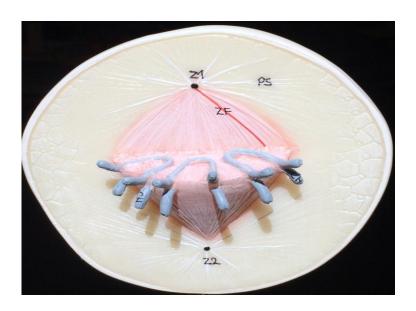


Prophase

Chromatin condenses into chromosomes in the nucleus (K). Nucleolus (N, red) still present, Model 1: Spindle apparatus (Z1, Z2) forms.

Nuclear membrane disappears, nucleolus disappears, centrosomes (PS) on opposite poles Model 3: of cell, chromosomes (CH) attach to spindle apparatus and begin migrating to metaphase plate (shown)

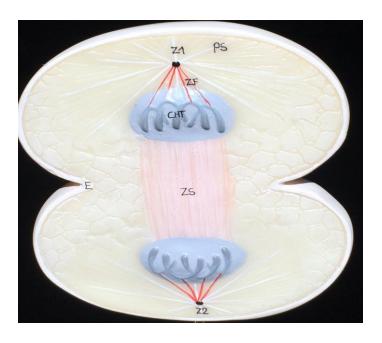


Metaphase

Model 4: Chromosomes (CH) line up on metaphase plate at the center of the cell (shown)

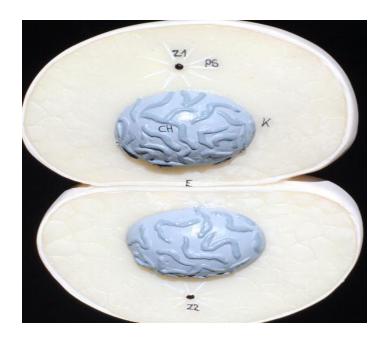


Mitosis Model Key:



Anaphase

Model 5: Centromere on chromosomes (CH) split to begin anaphase. Spindle (Z1, Z2) contracts and moves sister chromatids (chromosomes) to opposite poles of the cell



Telophase

Model 8:

Chromosomes reach opposite poles and clump; events of prophase are reversed (nuclear membrane reforms, nucleolus reforms, chromosomes de-condense, spindle apparatus disappears); cytokinesis (Division of the Cell is completed)

This resource was prepared by the Tallahassee Community College Learning Commons