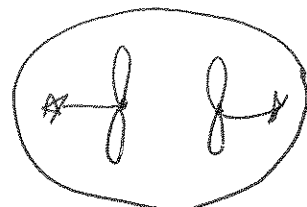
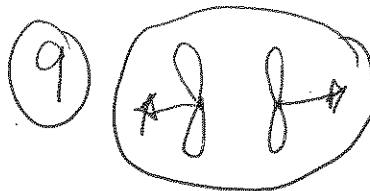
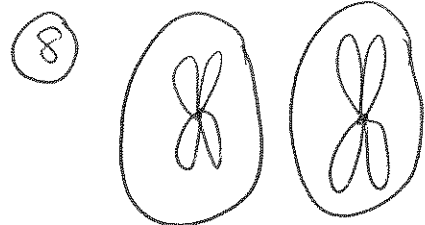
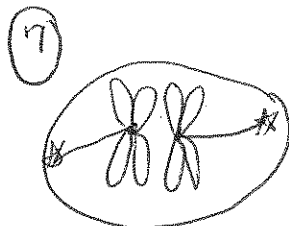
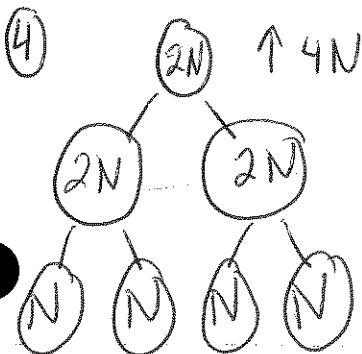
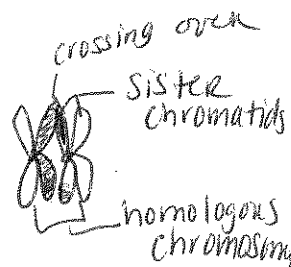


# MEIOSIS REVIEW

Name \_\_\_\_\_

**DIRECTIONS** – Answer each of the following questions completely. In some cases a drawing may be helpful.

1. What is the difference between haploid and diploid? → 2 copies of chromosomes  
↳ 1 copy of chromosomes
2. Define synapsis.  
↳ time when a tetrad forms
3. Draw a tetrad. Label homologous chromosomes and sister chromatids. Draw crossing over. Define genetic recombination  
↳ new combination of genetic info.
4. Draw the "big picture" of meiosis.  
(See below)
5. What is the purpose of mitosis? to create more cells
6. What is the purpose of meiosis? to create cells that can start a new organism
7. Draw metaphase I of meiosis. What is lining up in the middle of the cell?  
(See below) ↳ homologous chromosomes
8. Draw telophase I. Why isn't meiosis complete after telophase I?  
(See below) ↳ not haploid cells
9. Draw anaphase II. What is being separated? What is different between anaphase II of meiosis and anaphase of mitosis?  
(See below) ↳ nothing ↳ sister chromatids
10. What is the result of meiosis? 4 haploid gametes
11. Differentiate between gametes and body cells (somatic cells).  
↳ egg + sperm ↳ any cells in humans but
12. What process is required to produce gametes? What process is required to produce body cells? - mitosis  
↓  
meiosis

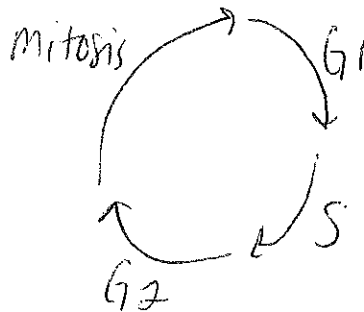


# REVIEW SHEET MITOSIS

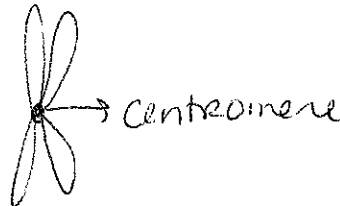
Name \_\_\_\_\_

Key

1. Draw the cell cycle and label all parts and indicate what occurs in each part.



2. Draw sister chromatids connected by a centromere. Are these identical or similar?



3. The phase of mitosis in which the sister chromatids line up in the middle of the cell is metaphase
4. In what phase are the sister chromatids pulled apart to opposite poles of the cell? anaphase
5. In what phase is the nucleolus and nuclear membrane visible in one cell? interphase
6. In what phase are the chromosomes visible for the first time? prophase
7. In what phase does the nuclear membrane and nucleolus disappear? prophase
8. In what phase does the nuclear membrane and nucleolus reappear in two cells? telophase
9. What structure pulls the sister chromatids apart? centrioles
10. In what stage do the centrioles move to opposite poles? prophase

11. In what stage do the centrioles duplicate? ~~prophase~~ interphase <sup>(5)</sup>
12. What is the purpose of mitosis? to ~~make~~ create  
more cells.
13. List the stages of mitosis in order. P, M, A, T
14. Is interphase considered apart of mitosis? no

# MEIOSIS REVIEW

Name \_\_\_\_\_

**DIRECTIONS** – Answer each of the following questions completely. In some cases a drawing may be helpful.

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↳ 1 copy of chromosomes
2. Define synapsis.  
↳ time when a tetrad forms
3. Draw a tetrad. Label homologous chromosomes and sister chromatids. Draw crossing over. Define genetic recombination  
↳ new combination of genetic info.
4. Draw the "big picture" of meiosis.  
(see below)
5. What is the purpose of mitosis? to create more cells
6. What is the purpose of meiosis? to create cells that can start a new organism
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(see below) ↳ homologous chromosomes
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10. What is the result of meiosis? 4 haploid gametes
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meiosis

