Name_____

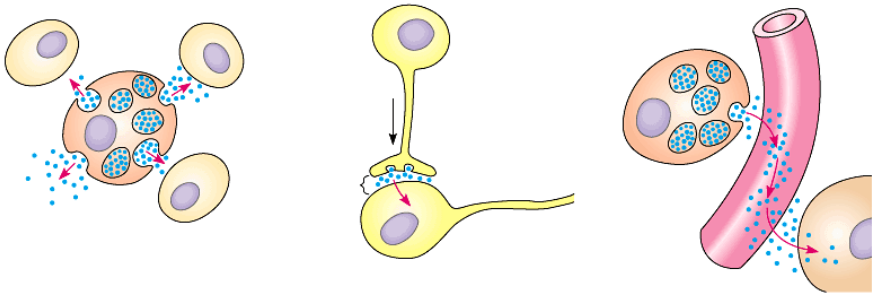
AP Biology Chapter 11 Guided Reading Campbell Biology 6th Edition

1. When did cell signaling evolve?
2. What is some of the evidence for that?

3. Define Signal Transduction pathway

4. Define the following
    a. Local regulator
    b. Hormone
    c. Pheromones (you'll have to look this up in another chapter)
    d. Local regulator
    e. Paracrine signaling
    f. Synaptic signaling

5. Using those terms, label the following diagram:



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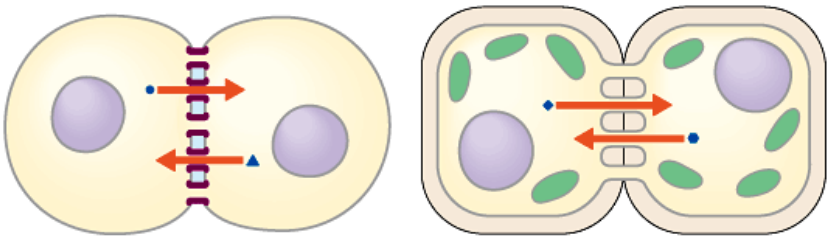
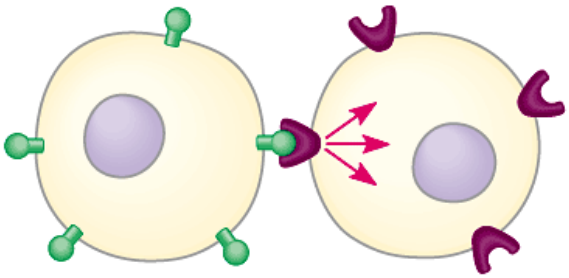
6. List and Explain the three stages of signaling.

7. How do the cell junctions affect the signaling systems.





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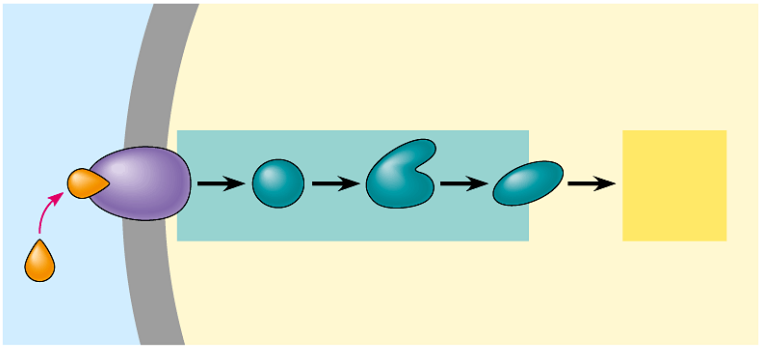
8. Label the following diagram with the stages of signaling.



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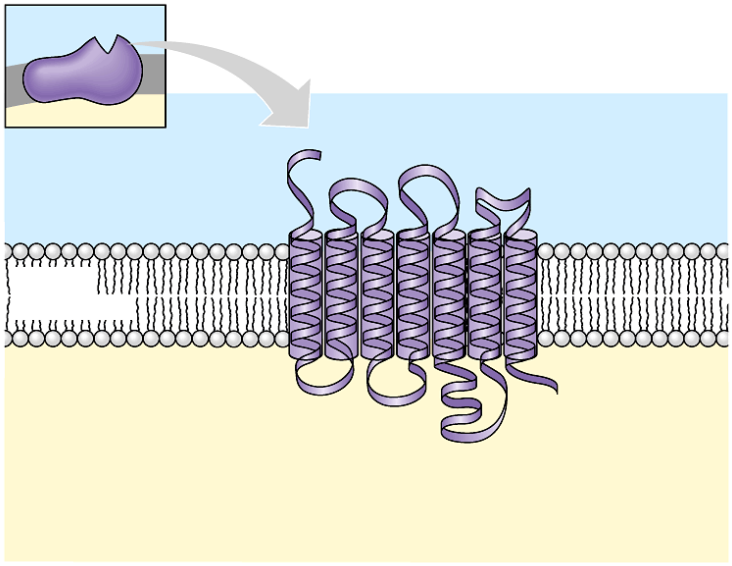
9. Define Ligand

10. What is a G protein-linked receptor?

11. Label the following:



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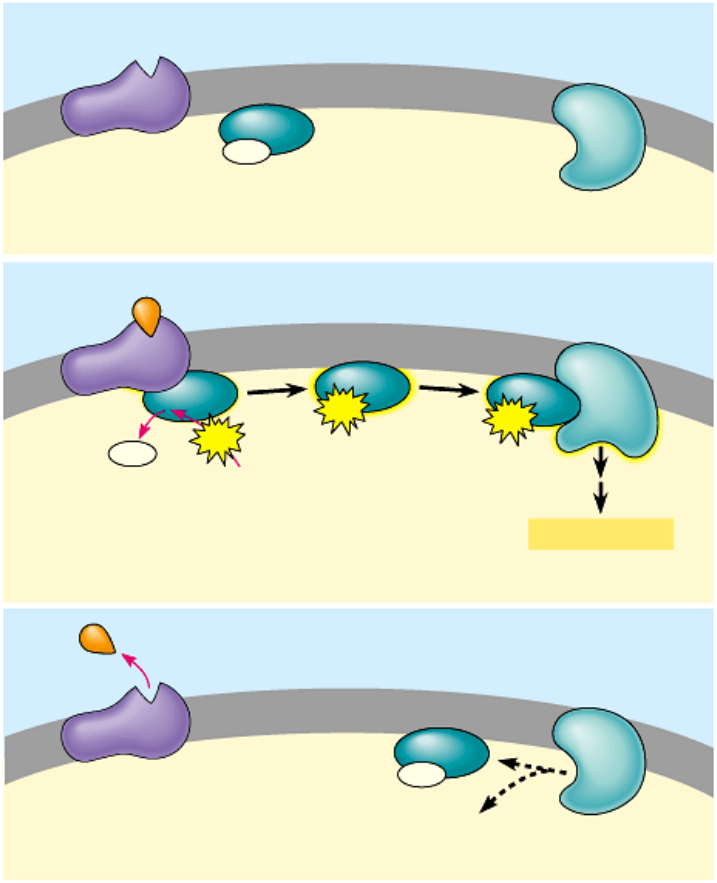
12. Label the following diagram of the functioning of a G protein linked receptor.



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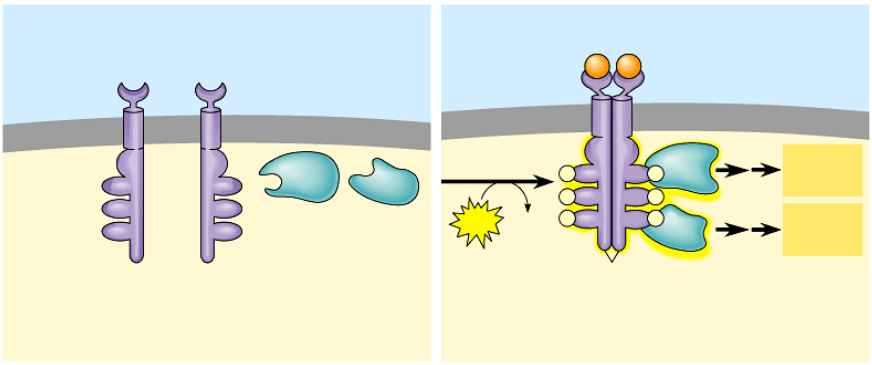
13. What is a kinase?

14. Label the diagram of the Tyrosine kinase receptor below.



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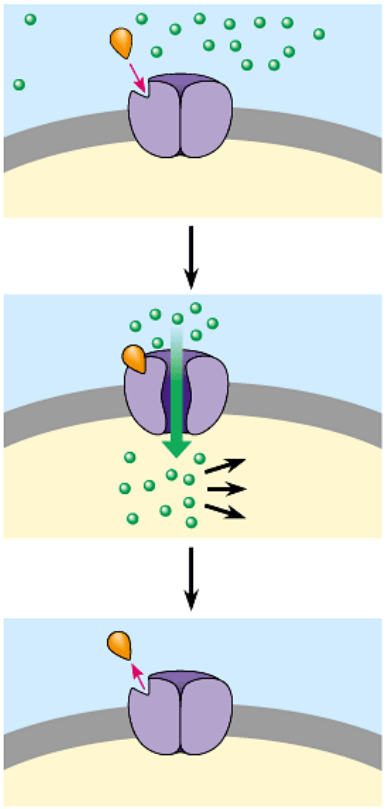
15. Label and title the diagram below.



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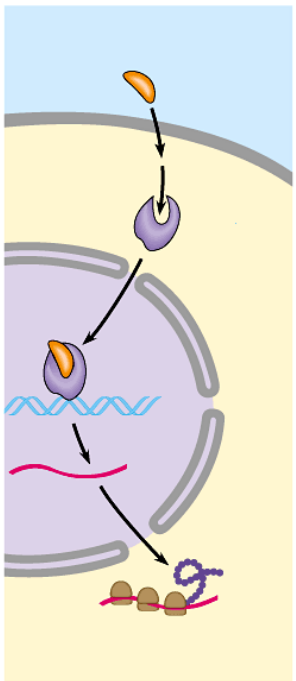
16. Label the diagram below



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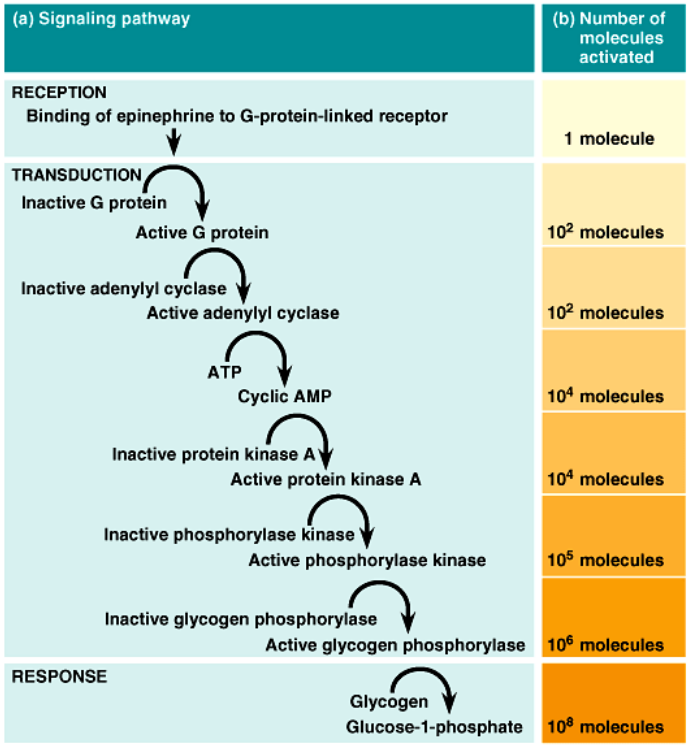
16. The importance of the signal transduction pathway is important because of amplication. Explain what is meant by amplication.



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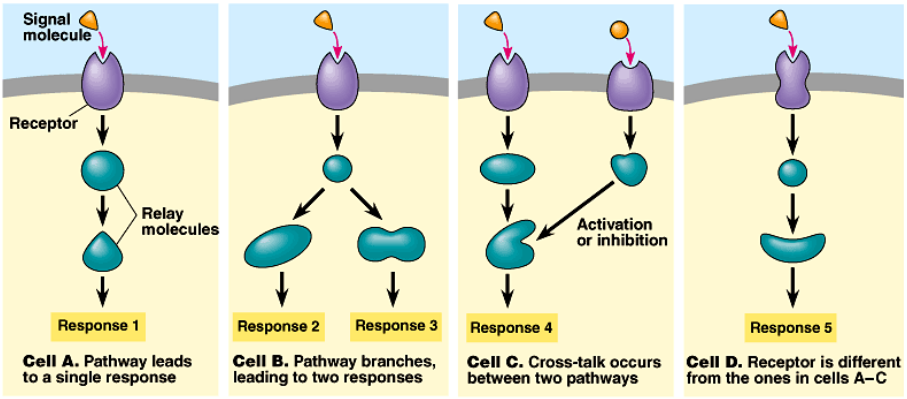

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17. What is the significance of the diagram above?