Define Cellular Respiration:

Balanced Equation:

|  |  |  |  |
| --- | --- | --- | --- |
| STAGE | LOCATION | DESCRIPTION | NET ATP PRODUCED |
| GYCOLOSIS |  |  |  |
| KREB'S CYCLE |  |  |  |
| ELECTRON TRANSPORT CHAIN |  |  |  |

Fill in the diagram below using the image from your text book on page 148. Write the name of the stage and where in the cell it takes place

***Stage 1:*** **cytoplasm** of a cell

***Stage 2:*** **mitochondria** of a cell

***Stage 3:*** **mitochondria** of a cell



Compare and Contrast table for Photosynthesis and Cellular Respiration

|  |  |  |
| --- | --- | --- |
|  | Photosynthesis | Cellular Respiration |
| Who (what kind of organisms preform each process?) |  |  |
| What (what is the BALANCED equation?)What are the reactants and products? Circle the reactants and draw a line under the products. |  |  |
| When will this process occur? |  |  |
| Where (what organelle(s)) |  |  |
| Why do organisms use each of these process? |  |  |
| How (what are the processes or reactions involved) |  |  |

Answer the following questions.

1. How is energy cycled within photosynthesis?
2. How is energy cycled within cellular respiration?
3. Explain in words and a diagram how these two processes form a cycle.
4. How is energy cycled between these two processes?
5. Draw the picture of ADP and ATP