**Lesson 3: Cell Respiration Is the Opposite of Photosynthesis**

1. Complete the photosynthesis reaction below:

\_\_\_\_\_\_\_\_\_ + \_\_\_\_\_\_\_\_\_\_ + \_\_\_\_\_\_\_\_\_\_ → \_\_\_\_\_\_\_\_\_\_ + \_\_\_\_\_\_\_\_\_\_

2. Sketch a mitochondrion here and label its parts:

3. How is the structure of mitochondria useful for carrying out cell respiration?

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

4. Complete the cell respiration reaction below:

\_\_\_\_\_\_\_\_\_ + \_\_\_\_\_\_\_\_\_\_ → \_\_\_\_\_\_\_\_\_\_ + \_\_\_\_\_\_\_\_\_\_ + \_\_\_\_\_\_\_\_\_\_

5. Write the reaction for cell respiration in the form of a sentence:

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.

6. Complete the T-chart to compare cell respiration and photosynthesis:

|  |  |
| --- | --- |
| **Cell Respiration** | **Photosynthesis** |
|  |  |

7. How is cell respiration the opposite of photosynthesis?

\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_.