

Topic: Cell vs. Organ System

Learning Objective/Outcome: Compare the functions of cell organelles to the functions of an organ system.

<u>Keywords/Questions</u>	<u>Notes</u>
What organ system is cytoskeleton similar to?	The cytoskeleton is similar to the skeletal and muscular system
Compare cytoskeleton, skeletal system, and muscular system.	They both provide structure and allows for movement within the cell
What organ system is the cell membrane similar to?	The cell membrane is similar to the integumentary system
Compare cell membrane and the integumentary system.	They both separate and protects the internal structures from the external environment and it regulates water loss
What organ system is mitochondria similar to?	The mitochondria is similar to the digestive system
Compare mitochondria to the digestive system.	They both break down nutrients to produce energy

<p>What organ system is similar to lysosomes and vacuoles?</p>	<p>The lysosome and vacuole are similar to the excretory system</p>
<p>Compare lysosomes and vacuoles to the excretory system.</p>	<p>They both store waste and removes waste</p>
<p>What organ system is the nucleus similar to?</p>	<p>The nucleus is similar to the nervous system</p>
<p>Compare the nucleus and nervous system.</p>	<p>The both provide instructions for the functioning of the system</p>

Summary

Cells are highly organized which allows for specialization of each cellular process. Through this specialization it ensures that each process occurs properly and efficiently within the cell. This is similar to how the body works as each system dedicated to a certain process that intertwine allowing for organisms to work as one unit.