

Cells, Tissues, Organs and Systems  
Lab #1- Characteristics of living things

NAME: \_\_\_\_\_ Date Due: \_\_\_\_\_

Purpose: To determine what makes something living or non-living.

Hypothesis:

IF \_\_\_\_\_

\_\_\_\_\_

THEN \_\_\_\_\_

\_\_\_\_\_

Procedure: Read page 15, steps #1 and #2 of the textbook under "try this."

DATA: Use this chart to record your observations.

<u>Dry Sand</u>	<u>Dry Yeast</u>
<u>Sand and Apple Juice</u>	<u>Yeast and Apple Juice</u>

*(Complete on loose leaf and attach it to this sheet when you hand it in.)*

Analysis Questions:

1. What happened in each container?
2. How was your prediction different from what you saw?
3. Why was important to use equal amounts of sand and yeast and apple juice?
4. Speculate (make an educated guess) about what happen in each container.

Sources of Error: (**Explain** one things that may have caused your experiment to be inaccurate. Be sure to explain how it may have altered your results.)

Conclusion: (answers the "problem" and tells whether or not your "hypothesis" was correct)

<u>1</u>	<u>2</u>	<u>3</u>
<ul style="list-style-type: none"> <li><input type="checkbox"/> Incomplete or not handed in by due date</li> <li><input type="checkbox"/> No hypothesis</li> <li><input type="checkbox"/> Messy or little data</li> <li><input type="checkbox"/> Poor knowledge exhibited in analysis questions</li> <li><input type="checkbox"/> Weak source of error</li> <li><input type="checkbox"/> Incorrect or unclear conclusion</li> <li><input type="checkbox"/> Poor conduct during lab</li> <li><input type="checkbox"/> Redo and parent signature required – upon completion you will receive 50%</li> </ul> <p style="text-align: center;">X _____</p>	<ul style="list-style-type: none"> <li><input type="checkbox"/> Complete by due date with accuracy</li> <li><input type="checkbox"/> Hypothesis <b>not</b> in "IF/THEN" form</li> <li><input type="checkbox"/> Accurate data</li> <li><input type="checkbox"/> Good knowledge exhibited in analysis questions</li> <li><input type="checkbox"/> Credible source of error</li> <li><input type="checkbox"/> Conclusion needs support</li> <li><input type="checkbox"/> Adequate conduct during lab</li> </ul>	<ul style="list-style-type: none"> <li><input type="checkbox"/> Completed by due date with detail</li> <li><input type="checkbox"/> Hypothesis in proper form</li> <li><input type="checkbox"/> Accurate &amp; clean data</li> <li><input type="checkbox"/> Excellent knowledge exhibited in analysis questions</li> <li><input type="checkbox"/> Insightful source of error</li> <li><input type="checkbox"/> Supported conclusion</li> <li><input type="checkbox"/> Model scientist/student</li> </ul> <p style="text-align: center; font-size: 1.5em;">/21</p>