Mr. Alexander Science 6

Statement of the Problem: 10%

* What question(s) are you trying to answer?

* Include any preliminary observations or background information about the subject

Hypothesis: 15%

* Write a possible solution for the problem.

* Make sure this possible solution is a complete sentence.

* Make sure the statement is testable, an if-then statement is recommended to illustrate what criteria will support your hypothesis (and what data would not support the hypothesis).

Materials: 5%

* Make a list of ALL items used in the lab. Alternatively, materials can be included as part of the procedure.

Procedure: 15%

* Write a paragraph (complete sentences) which explains what you did in the lab as a short summary.

* Add details (step-by-step) of your procedure in such a way that anyone else could repeat the experiment.

Results (Data): 20%

* This section should include any data tables, observations, or additional notes you make during the lab.

* You may attach a separate sheet(s) if necessary.

* All tables, graphs and charts should be labeled appropriately.

Conclusions: 30%

* Accept or reject your hypothesis.

* EXPLAIN why you accepted or rejected your hypothesis using data from the lab.

* Include a summary of the data - averages, highest, lowest..etc to help the reader understand your results. Try not to copy your data here, you should summarize and reference KEY information.

* List one thing you learned and describe how it applies to a real-life situation. *Discuss possible errors that could have occurred in the collection of the data (experimental errors)

Submission: 5%

Submission	5 points Submitted on time				
Problem Statement	Opoints No question posed	3 points Question but no preliminary or background information	6 points Question and at least one preliminary observation and one piece of background information		10 points Question and at least 2 pieces each of preliminary observation and background information
Hypothesis	0 points No attempt made at hypothesis	5 points A hypothesis is stated but not in a complete sentence or is not testable.	10 points A testable hypothesis is stated in complete sentence form without mention of supporting data.		15 points A testable hypothesis is stated in complete sentence form with mention of data that would support the hypothesis.
Materials	2 points A list of materials is provided by necessary or units of measure.	5 points A complete list of materials including amounts necessary and units of measure.			
Procedure	5 points The procedure description is provided but less than a paragraph.	10 points15 pointsThe procedural description meets or exceeds the minimum of one paragraph but lacks significant details that would make the experiment unlikely or impossible to duplicate by someone else.15 point The proceeds the meets minimized paragraph but lacks significant details meets minimized paragraph but lacks significant details meets minimized paragraph but lacks significant details meets minimized paragraph but lacks significant details minimized paragraph but lacks significant details minimized paragraph but lacks significant details meets10 points15 point meets minimized paragraph but lacks significant details minimized paragraph but lacks significant details minimized paragraph but lacks significant details minimized paragraph but lacks significant details meets10 points15 point meets minimized paragraph but lacks significant details minimized paragraph but lacks sinterval but lacks significant de			15 points The procedure description meets or exceeds the minimum of one paragraph and contains sufficient detail that the experiment could be duplicated by another person.
Results	0 - 5 points Little or no data is presented or what there is lacks appropriate labeling or organization.	10 points Much significant data is present but some appears to be lacking or poorly organized.	15 points All significant data is included but some tables, charts or diagrams are incorrectly labeled or utilized.		20 points All significant data is included. Charts or diagrams are used effectively and clearly and correctly labeled.
Conclusion	10 points The student neither accepts or rejects their hypothesis. Other elements of the analysis are missing or incomplete but the student has made an attempt to draw a conclusion.	20 points The hypothesis is expressly accepted or rejected. The reason is explained accompanied by a statement of what the student learned. A summary of important data is missing or incomplete and possible experimental problems or errors are not mentioned.		30 points The hypothesis is expressly accepted or rejected. The reason is clearly explained accompanied by a statement of what the student learned. A summary of the important data is included and possible experimental problems or errors are mentioned.	