|  |
| --- |
| **Science Fair Judging Sheet****Excellent 4, Above Ave. 3, Average 2, Below Ave. 1, Absent 0** **Score** |
| **Scientific Thought** | There is a clear hypothesis stated that can be answered through experimentation? |  |
| Does the material's list capture all the items used? |  |
| Did the student have 3 or more trials of their experiment to verify their findings? |  |
| Have variables and controls been identified? |  |
| **Creativity** | Does the Title/Question reflect the overall project? |  |
| Is this a unique and creative project? |  |
| Has the student shown creativity in the design of the display? |  |
| **Thoroughness** | The student has developed procedure for testing the hypothesis  |  |
| Student has developed and identified the control aspect of their experiment |  |
| Are there pictures/diagrams/visual aids that help explain the procedure, plan, and results? |  |
| Is the information accurate? |  |
| **Skill** | Are mathematical formulas correctly applied in the experiment or are observations explained? |  |
| Are there charts/graphs accompanying the data or conclusion? |  |
| To what degree does the project reflect the student's own work? |  |
| Does the conclusion support the results? |  |
| **Total** |  **/ 60** |

COMMENTS:

Teachers that require a report:

The report must follow the scientific writing process as shown below.

* Your final report will include these sections:
	+ Title page.
	+ Question and Hypothesis
	+ Material List
	+ Experimental Procedures
	+ Background research. This is the research you found before you started your experiment and have written.
	+ Data analysis and discussion. This section is a summary of what you found out in your experiment, focusing on your observations, data table, and graph(s), which should be included at this location in the report.
	+ Conclusions
* Your final report will be several pages long, but don't be overwhelmed! Most of the sections are made up of information that you have already written. Gather up the information for each section and type it in a word processor if you haven't already.
* Work in google docs it will automatically save your information. You do not want to work hard getting something written the perfect way, only to have your computer crash and the information lost. Frequent file saving could save you a lot of trouble!
* Remember to do a spelling and grammar check in your word processor. Also, have a few people proof read your final report. They may have some helpful comments!

**When Writing a Science Fair Project**

Writing a science fair project report may seem like a challenging task, but it is not as difficult as it first appears. This is a format that you may use to write a science project report. If your project included animals, humans, hazardous materials, or regulated substances, you can attach an appendix that describes any special activities your project required. Also, Triumphant Learning Center reports require abstracts and bibliographies.

You may find it helpful to fill out the science fair lab report template to prepare your report.

 **Title**

For a science fair, you probably want a catchy, clever title. Otherwise, try to make it an accurate description of the project. For example, I could entitle a project, 'Determining Minimum NaCl Concentration that can be Tasted in Water'. Avoid unnecessary words, while covering the essential purpose of the project. Whatever title you come up with, get it critiqued by friends, family, or teachers.

 **Introduction and Purpose**

Sometimes this section is called 'Background'. Whatever its name, this section introduces the topic of the project, notes any information already available, explains why you are interested in the project, and states the purpose of the project. If you are going to state references in your report, this is where most of the citations are likely to be, with the actual references listed at the end of the entire report in the form of a bibliography or reference section.

 **The Hypothesis or Question**

Explicitly state your hypothesis or question.

 **Materials and Methods**

List the materials you used in your project and describe the procedure that you used to perform the project. If you have a photo or diagram of your project, this is a good place to include it.

 **Data and Results**

Data and Results are not the same thing. Some reports will require that they be in separate sections, so make sure you understand the difference between the concepts. Data refers to the actual numbers or other information you obtained in your project. Data can be presented in tables or charts, if appropriate. The Results section is where the data is manipulated or the hypothesis is tested. Sometimes this analysis will yield tables, graphs, or charts, too. For example, a table listing the minimum concentration of salt that I can taste in water, with each line in the table being a separate test or trial, would be data. If I average the data or perform a statistical test of a null hypothesis, the information would be the results of the project.

 **Conclusion**

The Conclusion focuses on the Hypothesis or Question as it compares to the Data and Results. What was the answer to the question? Was the hypothesis supported (keep in mind a hypothesis cannot be proved, only disproved)? What did you find out from the experiment? Answer these questions first. Then, depending on your answers, you may wish to explain ways in which the project might be improved or introduce new questions that have come up as a result of the project. This section is judged not only by what you were able to conclude, but also by your recognition of areas where you could not draw valid conclusions based on your data.

**Project Lab Report Template**

**Title:**

**Student's Name:**

**Introduction:**

**Question:**

**Hypothesis:**

**Materials and Methods/Procedures:**

**Data tables:**

**Results/graphs/photos:**

**Conclusion:**

**References:**