

Spirit Creek Middle School
SCIENCE FAIR
6TH GRADE

Dear Parents/Guardians,

At SCMS, students in grades 6th through 8th will take part in the Science Fair. This is an exciting event that encourages students to think like young scientists, engineers, mathematicians, and/or technologists. During the next few weeks your child will be designing a project that uses the scientific method to solve a problem. We hope you agree that the educational benefits are numerous, as students develop skills in writing, oral presentation, creative thinking, and problem solving. **All students in grades 6 to 8th grade are required to complete an individual science fair project. The science fair project will count towards a science grade. Due 1/30/2020.**

Attached, you will find a description of the components that must be included on the final Science Fair project display.

If you have any questions, please feel free to contact me. Thank you in advance for your support and time.

Science Fair Project Topic _____

Student Name: _____

Parent Name: _____

Parent Signature: _____

NAME: _____ PERIOD: _____



Important Dates Project Timeline



	DUE DATE	ASSIGNMENT (S)	Check off when completed OR GRADE
Send out Packets		SUBJECT TO CHANGE ACCORDING TO TEACHER	
	12/19/20-12/20/20	CHOOSE YOUR TOPIC Earth, Life, Physical Turn in parent signature forms to your science teacher	
	1/7/20	Write question/ Hypothesis	
	1/13/20	<u>Write a Research Plan</u> Problem(Question) Hypothesis Materials Procedures	
	1/13/20-1/20/20	You should be working on your experiment. Ask teacher for guidance if needed	
	1/20/20	<u>Observations, results and conclusions are due.</u>	
	1/30/20	Projects Due	

NAME: _____ PERIOD: _____



Parts of the Project



The following section gives a brief description of each part that needs to be completed when conducting your science investigation.

Question: the question should run an experiment in which something is modified and the result can be recorded.

Example: Could the amount of sunlight affect the growth of a plant?

Hypothesis (prediction): A prediction is a tentative answer to a question that is investigated. The prediction forms a reasonable calculation about the result of the experiment and proposes a possible reason for your results. The prediction must be based on previous knowledge, observations or investigations and it's checked to see if it's found to be true or false during the investigation. Scientists use the word "Hypothesis" to refer to a prediction.

Example: if a plant is given sunlight and another plant is not given sunlight,

THEN the plant that doesn't receive sunlight will not grow as tall **BECAUSE** it will not have the sufficient energy to do so.

Materials: list the materials that you have used in your investigation.

Variables: what is changing?

Procedure: The procedure includes all the steps that were followed to organize and recollect the data. The procedure is written in a clear and sequential form, so that other people can follow these steps for the experiment. **Number each step and clearly state how you went about conducting your experiment.**

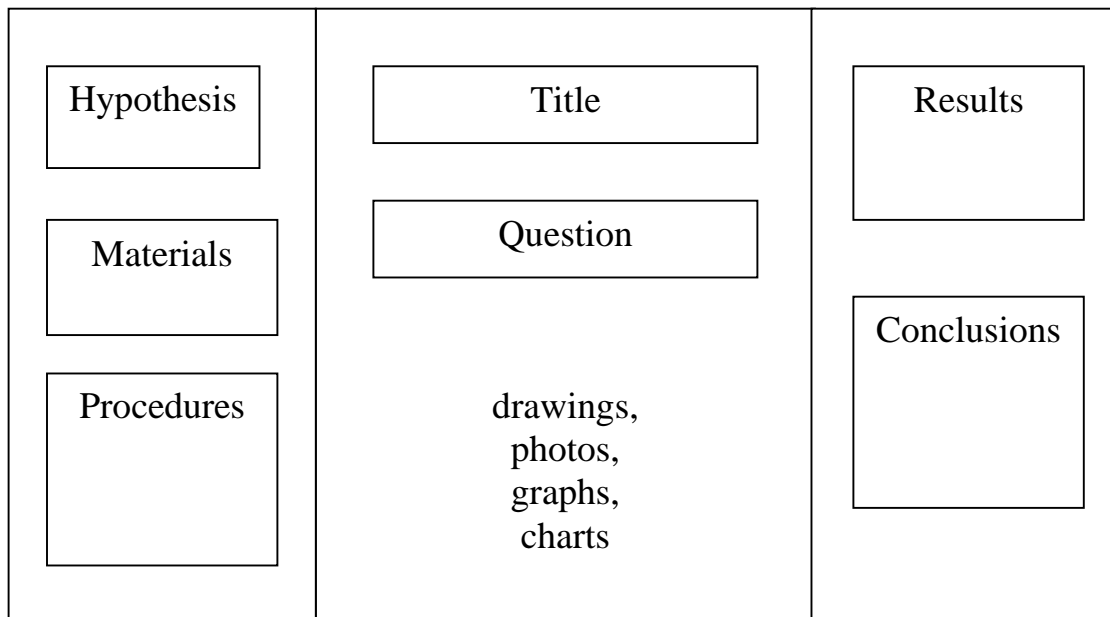
Data: Graphs, tables, and registry of notes, pictures and or drawings must be used to explain the results to the reader. Every science fair project must display data in the form of a graph or table.

Conclusion: The results of the experiment include the means taken, and the observations realized. This must include a written explanation of the results, the data that was observed and the media that was used for the experiment. Use the following phrases to write your conclusion:

Sample Science Fair Project

If student moves on to campus Science Fair then a standard science board will be required.

- Your display must include everything required. It must be organized in the correct order on the board. It must be neat, attractive, and easy to understand. Pictures and drawings make it more interesting. A chart or graph is highly recommended.
- Your display board must be sturdy enough to stand up by itself. It must fit on a table.
- **There must be no identifying information on the front of the display.** Your name, your teacher's name, your school's name, and pictures that show faces cannot be on the front of your display. **Write ALL IDENTIFYING INFORMATION on the BACK** of your display or attach a card at the bottom back with the following information: Teacher name, Student name, Grade level, Title.
- The board must be organized like the following drawing.



Science Fair Project Ideas

You may choose from this list, or create your own

Earth Science

- * The sun causes water to evaporate into the air, where it forms clouds and comes back down as rain or snow. Can wind speed, humidity, or temperature have an effect on the rate of evaporation? (Do one of these weather experiments to find out more.)
- * How good is soil at breaking things down? What can you find that is biodegradable? How can you test to see whether something is or not?
- * What holds more water, sand or soil? How does this affect what kinds of plants can grow in each?
- * Can you learn to predict the weather from the clouds? Try using a cloud chart to make your own forecast every day for a few weeks. How accurate was the cloud-forecast method?
- * You can also do an experiment to test different building designs for earthquake stability. Which designs are most stable?

Websites

The following are websites that students can use as resources to assist them when completing their science investigations:

<https://simplycircle.com/science-fair-projects-6th-grade/>

<https://www.education.com/science-fair/earth-space-science/>

<https://www.thoughtco.com/6th-grade-science-fair-projects-609028>

<http://www.all-science-fair-projects.com>

<http://www.sciencebuddies.com>