



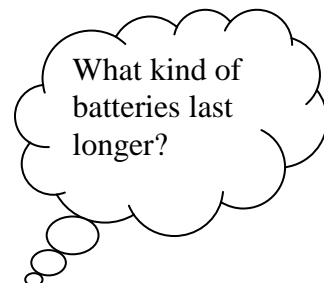
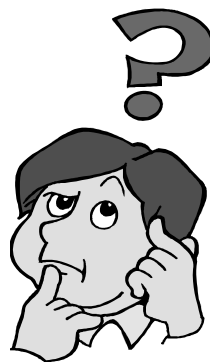
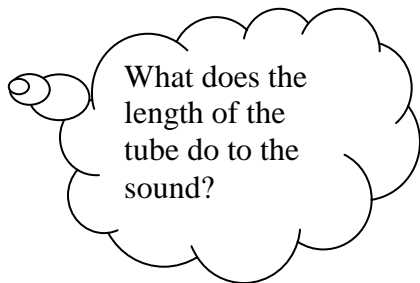
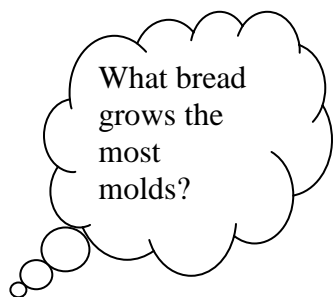
# **Crownhill Elementary**

## **Science Fair**

**Thursday**  
**February 26, 2009**  
**5:00 – 7:00 PM**

**Awards Presentation**  
**February 26, 2009**  
**6:00 PM**





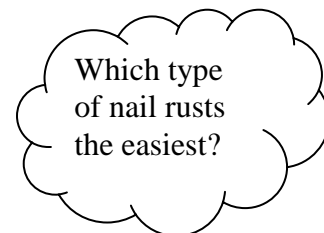
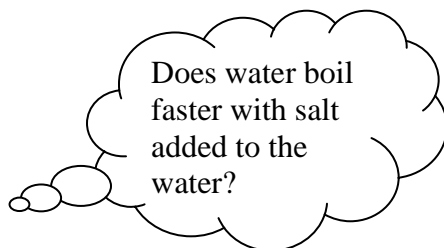
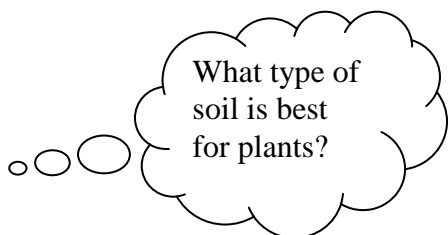
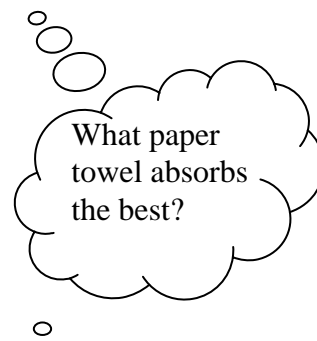
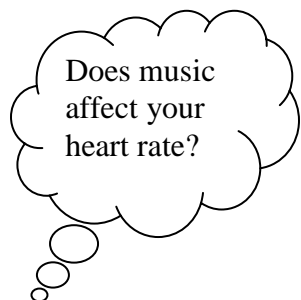
Dear Scientists,

You are invited to take part in Crownhill's Science Fair. This is an event that will give you a chance to question, think, discover, and present the findings of your science investigation.

The intent of the fair is to help you learn and share the scientific process. Science is observing our world, asking questions and discovering answers to our questions. Over the next few weeks, take the time to explore something new and experiment with collecting data to support your predictions.

Moms, Dads, and grown-ups can support you by encouraging you, helping you gather information and supplies, and by providing technical assistance. The final project needs to be your effort and design.

***Happy Observing, Questioning, Predicting, & Thinking!***



## Science Fair Time Line

<b>December 5, 2008</b>	<b>Parent Letter sent home.</b>
<b>December 12, 2008</b>	<b>Science fair packets sent home. All 4<sup>th</sup> and 5<sup>th</sup> grade students are required to participate in the science fair. K, 1, 2, and 3 are encouraged to participate.</b>
<b>January 21, 2009 January 21, 2009</b>	<b>1:30 – 3:00 Science Fair workshops for students needing help with their project. Meet in the Crownhill Library</b>
<b>February 18-23</b>	<b>4<sup>th</sup> and 5<sup>th</sup> grade projects judged in their classrooms</b>
<b>February 25, 2009</b>	<b>2-5:00 Students set up displays in the gym.</b>
<b>February 26, 2009</b>	<b>9:00-3:30 Science Fair judging Be prepared to present your experiment to the judges.</b>
	<b>5:00-6:00 Science Fair Public viewing of projects</b>
	<b>6:00- 6:30 Awards Ceremony</b>
	<b>6:30 – 7:00 Take projects down and take them home.</b>

## ***Guidelines***

### **Use the following guidelines for your experiment:**

1. Ask a question.
2. Make a prediction/hypothesis.
3. Write a procedure:
  - Make a materials list. Be specific. Include labeled pictures of your equipment and measuring tools showing quantities.
  - Write the steps to do the experiment. Use logical steps that are easy to repeat.
  - Have one controlled variable. (something that stays the same in the experiment)
  - Have one manipulated variable (something that is changed in the experiment)
  - Have one measured variable. (something that is measured in the experiment. Be sure to include the type of measurement.)
  - Make a data table to record your measured variable results.
4. Keep a project log of your experiment:
  - Record the observations you make of your experiment
  - Record the results (measured variable) in a data table.
  - Repeat the experiment several times.
5. Write a report that includes your procedure, what happened in your experiment, and a conclusion about your prediction. Was your prediction correct? Why or why not? What did you learn from your experiment?
6. Prepare a display showing your experiment and the results of your investigation.
7. Prepare a 2-3 minute oral presentation explaining your experiment and its results.



## Science Project Requirements

- \_\_\_\_\_ 1. Project Log
- \_\_\_\_\_ 2. Written Report
- \_\_\_\_\_ 3. Display
- \_\_\_\_\_ 4. Oral Presentation

### 1. Project Log

Use a spiral notebook or composition book to write your observations of your experiment. This will serve as your information for writing your written report. It should be hand-written, neat, detailed and a consistent record of your experiment's progress.



#### *Sample Project Log*

*12/ 22/2005 Planted seeds in a variety of soils. Gave each pot ¼ cup of water. Placed pots under light.*

*12/23/2005 Observed pots- no growth seen.*

*12/24/2005 Observed pots- no growth seen.*

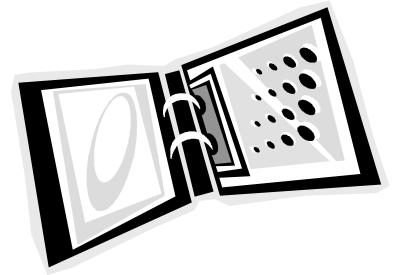
*12/25/2005 Observed pots- no growth seen. Gave each pot 3 tablespoons of water.*

*12/25/2005 Observed pots- Small sprout showing in pot with enriched soil. I wonder if it will grow the best?*



## 2. Written Report

This is the formal report of your experiment. It should be written or typed neatly with correct punctuation, grammar, and spelling. Design a creative cover and display it in a nice folder. This is your final draft. It should reflect your best work and give the audience the “I really know what I’m talking about” feeling.



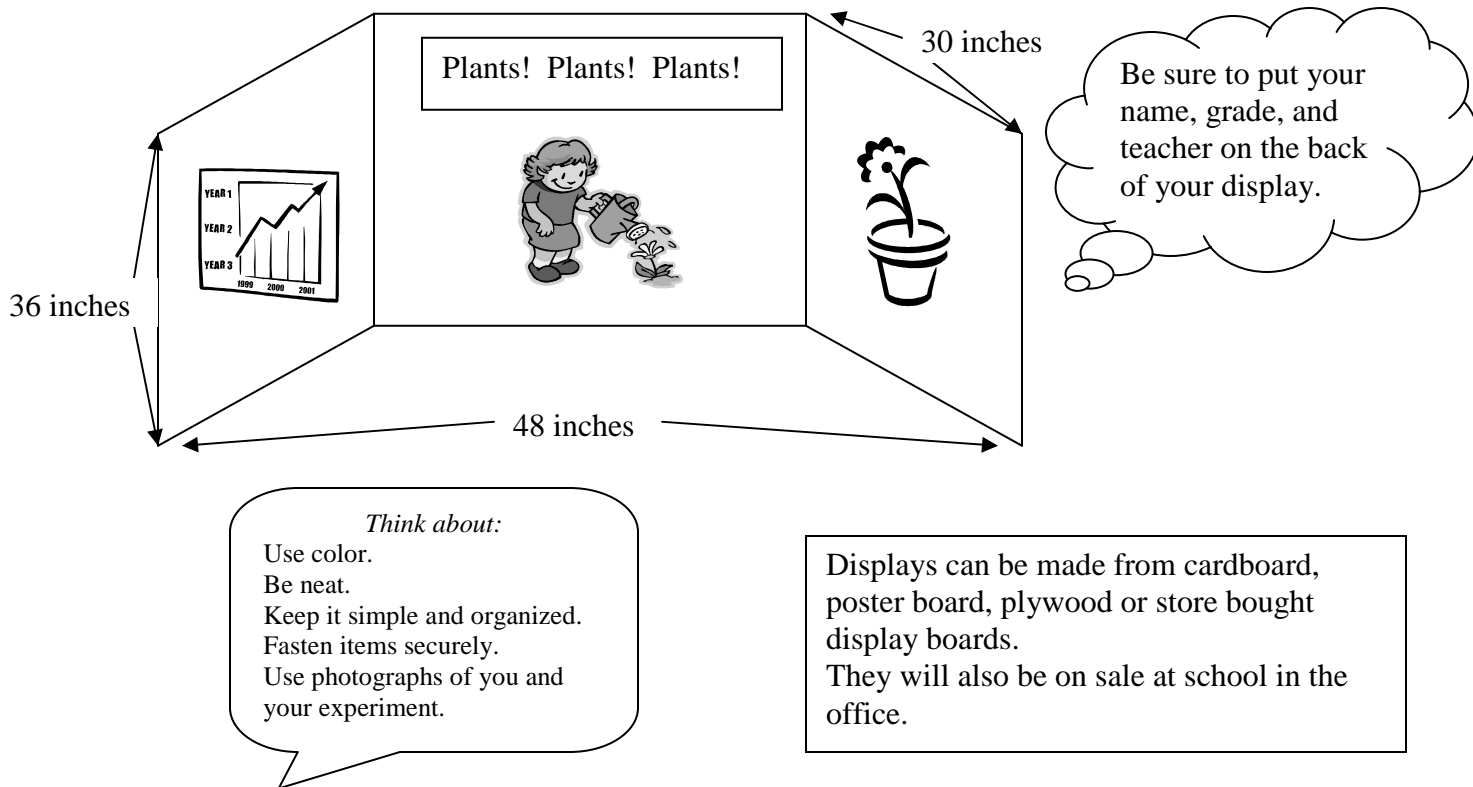
Your report needs to include:

1. **Title:** Be creative; capture your audience’s attention.
2. **Question:** What is your experiment about?
3. **Prediction/Hypothesis:** What do you think will happen?
4. **Materials List:** What equipment did you use in your experiment?  
Be sure to list your data table and charts. Include a labeled picture of your experiment. What did you use to measure your results?
5. **Procedure:** What did you do? Be sure to include all your organized steps and variables.
6. **Data:** What happened? Include data tables, graphs, and results.
7. **Analysis:** What does your data tell you? What did you find out about your question?
8. **Conclusion:** Did you confirm your prediction/hypothesis?
9. **Bibliography:** What books did you read? What internet sites did you use? Where did you get your information?



### 3. Display

Your display will tell the public what you did. It needs to be easy to read and fun to look at. It should include your title, question, prediction, pictures of your experiment, graphs of your results, and any interesting information you want to share about your experiment. Use your imagination.



### 4. Oral Presentation

Prepare a 2-3 minute talk about your experiment. This is your time to share with the judges what you did. Tell why you picked your question, what your prediction was, what you did in your experiment, what the results were, and was your prediction right or wrong. Use your display to help you remember what to say. Be enthusiastic! Share with your audience the fun you had with your experiment. Be ready to answer questions about your work. Be proud of your accomplishment.



## *Judging*

Our judges for the science fair come from the community. They are interested in science and enjoy working with our students.

All science projects will be judged during the school day. Judges will examine the projects, listen to students' oral presentations, and ask questions about the project. All projects will receive a ribbon or certificate based on the points they have earned from the judges.

Students are asked to put their names, teacher's name, and grade on the back of their projects. The judges will identify the project by a number, which will be assigned to students upon receipt of their entry form.

All students entering need to fill out an entry form. This enables us to plan space for their projects.

If the project meets the state criteria, the Best of Show in each grade will be invited to represent Crownhill at the State Science Fair at Olympic College. This fair is open to all students. The Best of Show students' registration fee into the state fair will be paid for by Crownhill PTA. Other students wishing to participate may contact the school for more information.

The following page is the form judges will use for evaluating each project.



## Crownhill Elementary Science Fair Judging Criteria

Project # \_\_\_\_\_ Project Title \_\_\_\_\_ Total Points \_\_\_\_\_

**Grading** 0 = absent 1 = present 2 = meets criteria 3 =exceeds criteria

### Knowledge of Scientific Method:

**Question:** clear, concise and able to be answered through experimentation. **0 1 2 3**

**Prediction:** relates to the question and identifies some rationale for the prediction. **0 1 2 3**

**Materials:** includes equipment, measuring tool, labeled pictures of equipment. **0 1 2 3**

**Procedure:**

- logical steps to do experiment, **0 1 2 3**
- a control variable, (something that stays the same) **0 1 2 3**
- a manipulated variable, (something they changed) **0 1 2 3**
- a responding variable, (something they measured) **0 1 2 3**
- repeated trials **0 1 2 3**

**Data:** organized through charts, graphs, or tables. **0 1 2 3**

**Analysis:** connects their data with their question. It demonstrates an understanding of their results. **0 1 2 3**

**Conclusion:** relates to whether or not their prediction was proved. **0 1 2 3**

### Project Log:

**Observations:** There is evidence of observations and ongoing work. **0 1 2 3**

**Quality:** Hand written, neat, chronological, detailed and consistent **0 1 2 3**

**Written Report:**

**Complete:** Report includes:

• Question:	0	1	2	3
• Prediction/hypothesis:	0	1	2	3
• Materials list	0	1	2	3
• Procedure:	0	1	2	3
• Data:	0	1	2	3
• Analysis:	0	1	2	3
• Conclusion:	0	1	2	3
• Bibliography	0	1	2	3

**Quality:** Report is neat and organized. 0 1 2 3

**Display:**

**Information:** Display clearly explains project and shows evidence of student work. 0 1 2 3

**Quality:** Display is neat, organized and easy to read. 0 1 2 3

**Oral Presentation:**

**Knowledge of project:** Student understands their project. 0 1 2 3

**Communication:** Students spoke clearly and were easy to understand. 0 1 2 3

Would you recommend this project for Best of Show?

\_\_\_\_\_  
Yes

\_\_\_\_\_  
No

**Judges Comments:**