

## LGMS Science Fair Written Report

- Your final report will include these sections:
  - ✓ Title page.
  - ✓ Abstract. An abstract is an abbreviated version of your final report.
  - ✓ Table of contents.
  - ✓ Question, variables, and hypothesis.
  - ✓ Background research. This is the Research paper you wrote before you started your experiment.
  - ✓ Materials list.
  - ✓ Experimental procedure.
  - ✓ 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.
  - ✓ Ideas for future research. Some science fairs want you to discuss what additional research you might want to do based on what you learned.
  - ✓ Acknowledgments. This is your opportunity to thank anyone who helped you with your science fair project, from a single individual to a company or government agency.
  - ✓ Bibliography.
- Write the abstract section last, even though it will be one of the first sections of your final report.
- 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.
- Save your document often! 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. Also, have a few people proof-read your final report. They may have some helpful comments!

## LGMS Science Fair Abstract

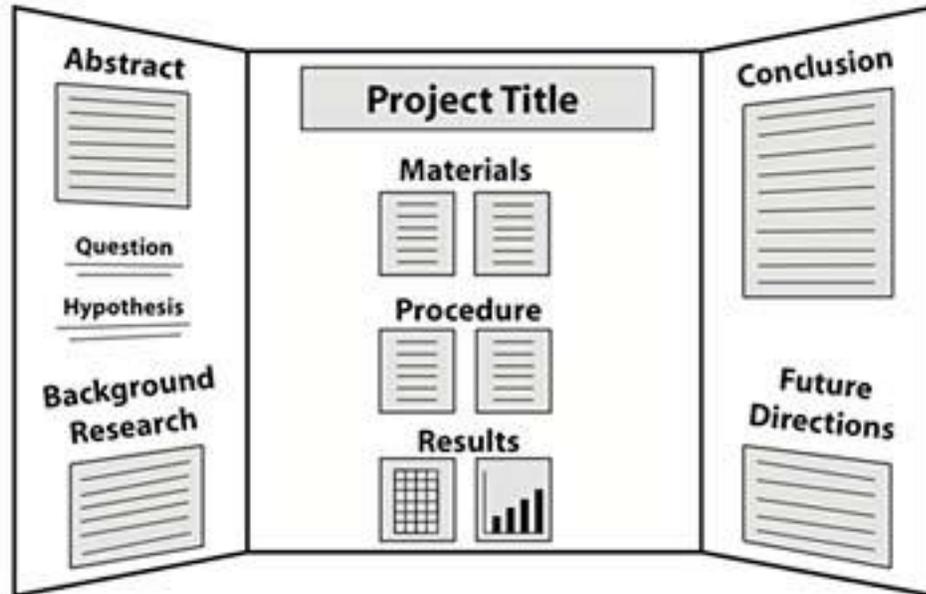
An abstract is an abbreviated version of your science fair project final report. The abstract is a maximum of 250 words. The science fair project abstract appears at the beginning of the report as well as on your display board.

Almost all scientists and engineers agree that an abstract should have the following five pieces:

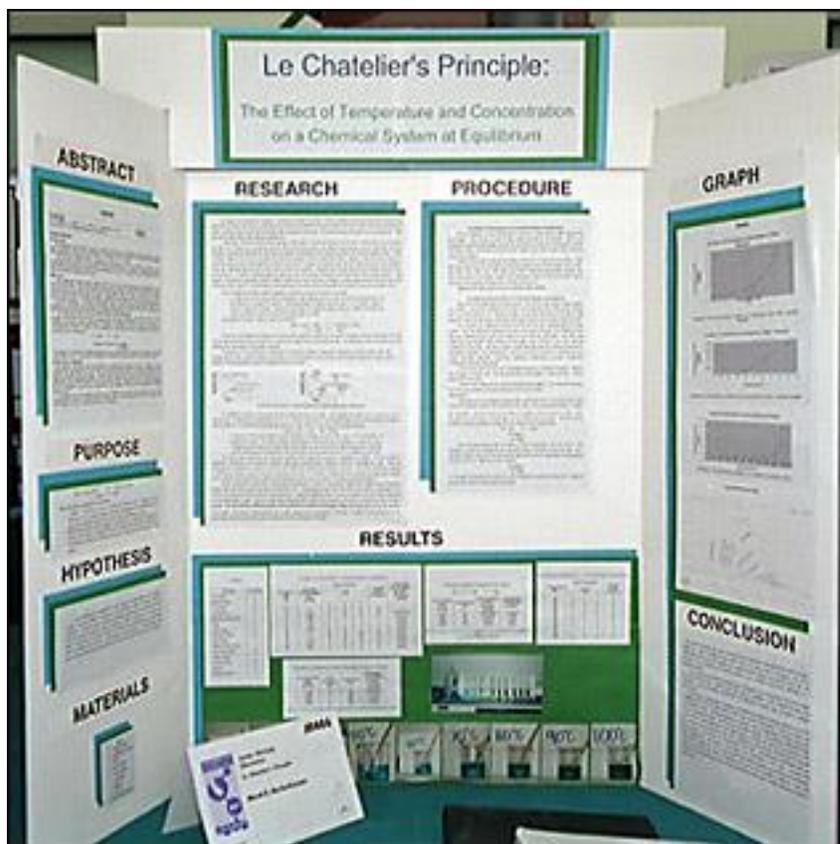
- **Introduction.** This is where you describe the purpose for doing your science fair project or invention. Why should anyone care about the work you did? You have to tell them why. Did you explain something that should cause people to change the way they go about their daily business? If you made an invention or developed a new procedure how is it better, faster, or cheaper than what is already out there? Motivate the reader to finish the abstract and read the entire paper or display board.
- **Problem Statement.** Identify the problem you solved or the hypothesis you investigated.
- **Procedures.** What was your approach for investigating the problem? Don't go into detail about materials unless they were critical to your success. Do describe the most important variables if you have room.
- **Results.** What answer did you obtain? Be specific and use numbers to describe your results. Do not use vague terms like "most" or "some."
- **Conclusions.** State what your science fair project or invention contributes to the area you worked in. Did you meet your objectives? For an engineering project state whether you met your design criteria.

## LGMS Science Fair Display Board

For every science fair project, you need to prepare a **display board** to communicate your work to others. You will use a standard, three-panel display board that unfolds to be 36" tall by 48" wide.



- **Organize your information like a newspaper** so that your audience can quickly follow the thread of your experiment by reading from top to bottom, then left to right. Include each step of your science fair project: Abstract, question, hypothesis, variables, background research, and so on.



- **Use a font size of at least 16 points** for the text on your display board, so that it is easy to read from a few feet away. It's OK to use slightly smaller fonts for captions on picture and tables.
- **The title should be big and easily read from across the room.** Choose one that accurately describes your work, but also grabs peoples' attention.
- **A picture speaks a thousand words!** Use photos or draw diagrams to present non-numerical data, to propose models that explain your results, or just to show your experimental setup. But, don't put text on top of photographs or images. It can be very difficult to read.