

Preparing Effective Poster Presentation: Do's and Donot's

Nadir Erbilgin
Dept Renewable Resources

Critical Attributes of Effective Posters

- To promote personal contact and the exchange of ideas on an individual level.
- Posters should be eye-catching as well as scientifically accurate and tastefully laid out.

Why do you need to make your poster effective?



Critical Attributes of Effective Posters

- Preparation
 - Define your audience
 - Deliver coherent and effective message
- Content
 - Original, well planned & thoroughly researched
- Presentation
 - Effectively present your poster using graphics or figures

Choose fonts that are legible

- Use upper and lower case type throughout the poster
- ALL UPPER CASE TYPE IS MORE DIFFICULT TO READ

Fonts in Poster Design
Fonts in Poster Design
Fonts in Poster Design

Use simple
font style

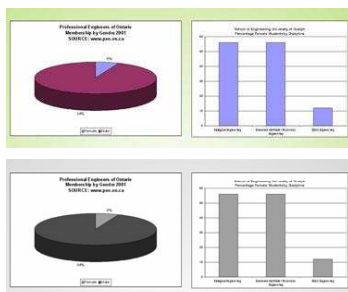
~~Fonts in Poster Design~~
~~Fonts in Poster Design~~
~~Fonts in Poster Design~~

Avoid using
complicated
fonts

Creating Legible Text

- **Title – Title – Title**
- Sub-titles- Sub-titles-Sub-titles
- Main text - Main text - Main text
- References – References- References

Using Graphics for Impact



Graphics should be
attractive, clear &
specific

Colour your graphics

Provide captions for your
graphics

Use Right Resolutions for Pictures



Using Backgrounds & Colour Effectively

- Colour highlights, separates, defines & associates information on your poster
- Colours and backgrounds should be subtle
- Background colours should always be light enough to see your main text
- Colours may look different on your screen than they will in your print

Choose a colour scheme that is harmonious

Colour Combination

Colour Combination

Colour Combination

Colour Combination

Colour Combination

Colour Combination

Good Contrast

Clashing Colours

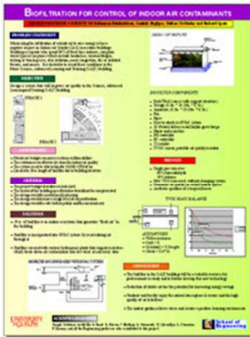
Light Letters

Light background

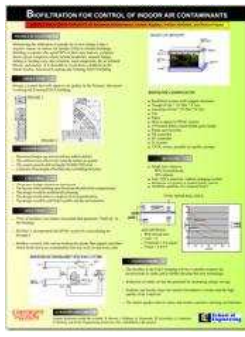
Dark Letters

Dark background

Background Colours

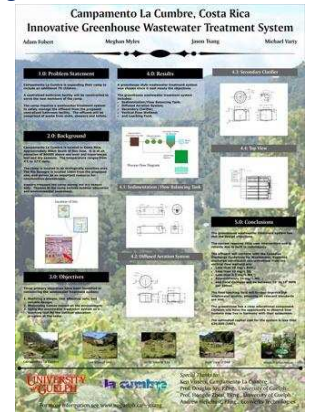
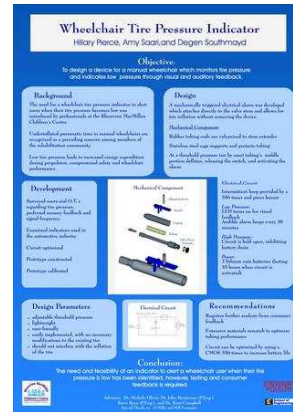


Too much colours

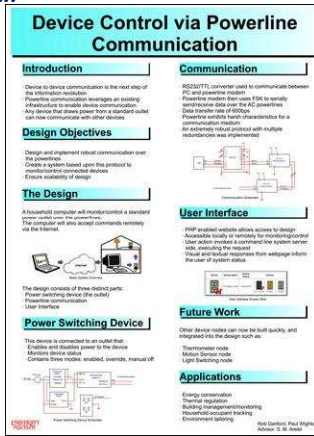
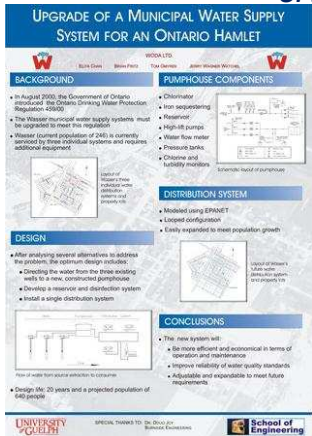


Stick to 2 to 3 colours

Create a box for your text to emphasize it and to make it organized

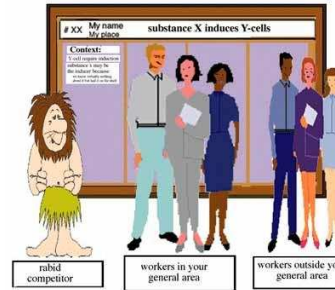


Or ...

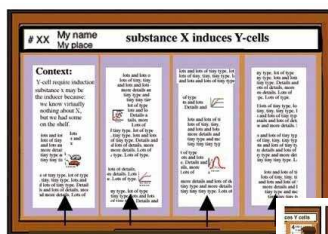
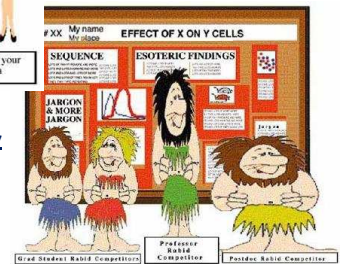


Design for three audiences

- (1) Close competitors
- (2) Colleagues in your general area (main audience)
- (3) Colleagues outside your area ("bonus" audience)

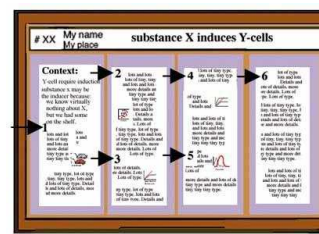
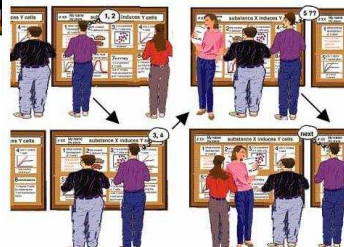


Design for your competitors only
Be so opaque that only your most close competitors can follow your work



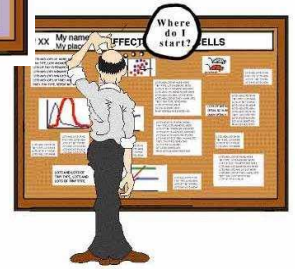
Layout in column format
Lets your audience read the entire poster as they proceed from left to right

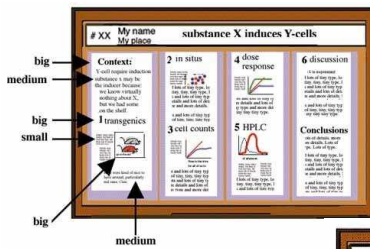
Layout in rows, left to right
Viewers who read the first row may be unable to fight their way back to the beginning



Indicate the sequence
Supply clues to help viewers follow your presentation

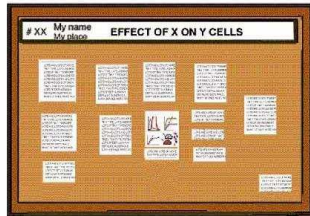
Let them guess the sequence
Avoid clues that would help people to follow your presentation



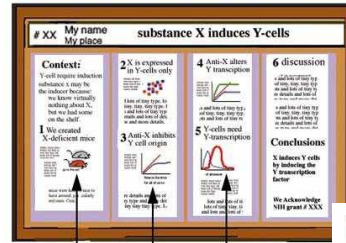
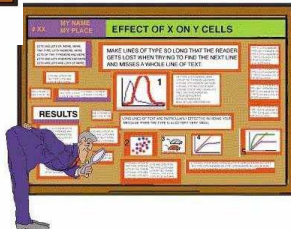


Use visual grammar
Graphic hierarchy reflects the relative importance of critical elements

Emphasize text, not graphics
A publication-style format, like a journal article, supplies every detail

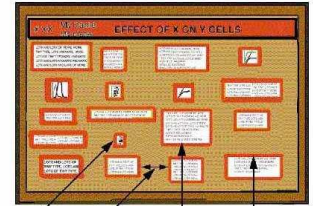


Text is readable at a distance
Make text hard to read
If the text is impenetrable, many viewers will just go away. Start with tiny text.
Make lines of text so long that the readers lose their place when trying to find the next line.



Emphasize visually
Graphic, cartoons, and figures should dominate. Write explanations directly on the figures

Visually de-emphasize substance
Portray the main points in the tiniest type. Make all figures so small that the important information is invisible 2 ft away



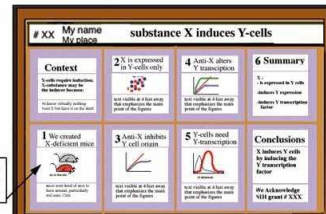
Content: Select only the most pertinent data to report on the poster

- Title
- Authors & affiliations, email or other address
- Abstracts are essential and should be highlighted
- Introduction
- Description of the methods used
- Brief results
- Brief discussions
- Brief conclusions
- References and Acknowledgements

How to make a poster that attracts an audience?

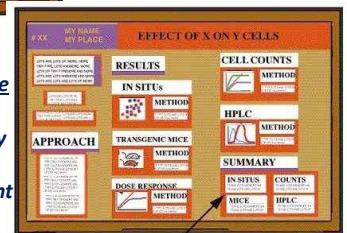
Nadir Erbilgin
230A ESB, Dept of Renewable Resources, University of Alberta, Edmonton

<p>Abstract</p> <ul style="list-style-type: none"> • Summary of research question, the methods, the data, and the conclusions 	<p>Methods</p> <ul style="list-style-type: none"> • The treatments, procedures, and/or protocols you studied • Whether the subjects and/or the researchers were blinded • What devices you used • What outcomes were measured 	<p>Discussion</p> <ul style="list-style-type: none"> • What your results mean. • Present supporting evidence. • Any contradictory findings and limitations should be addressed
<p>Introduction</p> <ul style="list-style-type: none"> • Clearly explain the rationale of your study • Why did you do the study? • Includes research questions and objectives 	<p>Results</p> <ul style="list-style-type: none"> • What you found in your study • Includes statistical analysis and tables and/or figures 	<p>Conclusions</p> <ul style="list-style-type: none"> • Directly relate to your study's research questions and hypotheses
		<p>References</p>
		<p>Acknowledgements</p>

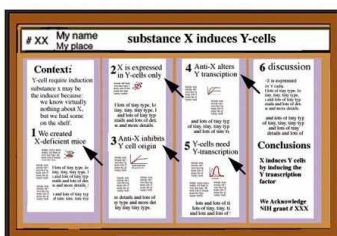


Keep it simple
Edit ruthlessly. Reduce sentence complexity, and delete details. State the message instead.

Emphasize the methods, not the message
In the methods section, identify every detail of your methods. Emphasize methods over content in the results.

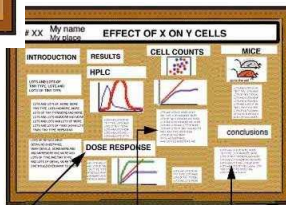


Even the conclusion or summary should emphasize the methods

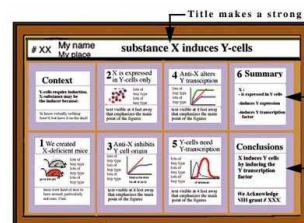


Emphasize essential information
State the take-home messages in large section headings

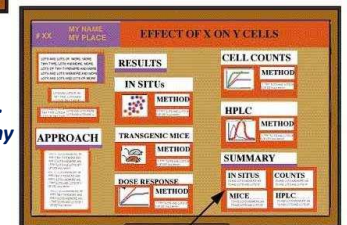
Be wordy, but avoid explanations
Avoid substance or explicit statements. Particularly avoid highlighting the message in large type



Large type states methods, not results
Results artfully buried in a methods description
Carefully omits interpretations



Never draw conclusions
Never specify real information. Avoid committing yourself to any strong statement.

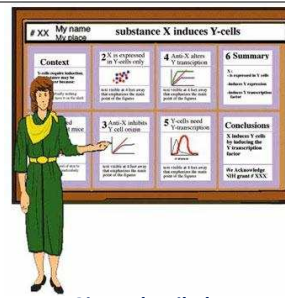


Even the conclusion or summary should emphasize the methods

Differentiate data, summaries, and conclusions
Step beyond merely stating the results. Make the strongest statements your data will support.

Presentation

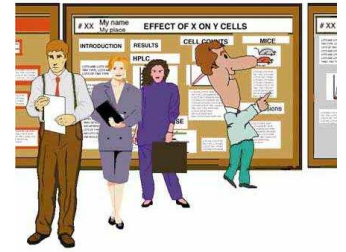
- Prior to the meeting
 - Check for the size and orientation of poster
 - Bring handouts that include the abstract and any supplementary information
- Just before the meeting
 - Arrive 20-30 minutes before the scheduled poster session
 - Set up the poster on the board with the number that corresponds to number of your presentation as it appears in the program



Give a detailed tour
Carefully read every line.
 When people ask you for a tour of your poster, lead them through it carefully and slowly. Read them all the text; Trace every line on every graph.

Use the graphics when you talk
 Don't read your poster: use it as a visual aid.

When people ask you for a tour of your poster, use the graphic elements to explain your work.



Energy and Water Savings Design of INNOVATION TOWERS II

Design Team: Amir Loomis, Michael Tross & Emily Wassman; Advisor: Dr. Warren Stiver

Objectives/Justification

- To increase energy and water saving strategies in an aging commercial building in Guelph, ON.

Implementation

- Blower Door
- Double Glazed Argon Filled Windows
- Insulation on Exterior Walls
- Drain Water Heat Exchanger
- Low Flow Showerheads, Efficient Toilet/Tankless Units

Economic Summary

Alternative	Estimated Cost	Estimated Savings	Payback Period
Blower Door	\$1,000	\$100	10 Years
Double Glazed Argon Filled Windows	\$10,000	\$1,000	10 Years
Insulation on Exterior Walls	\$5,000	\$500	10 Years
Drain Water Heat Exchanger	\$2,000	\$200	10 Years
Low Flow Showerheads, Efficient Toilet/Tankless Units	\$1,000	\$100	10 Years

Summary

A survey was distributed to the residents to evaluate what energy and water saving measures were already in place.

Alternatives

- Solar Power
- Geothermal Power
- Wind Power
- Electric Windows
- Drain Water Heat Exchanger
- Tankless Water Heater
- Smart Metering
- Efficient Toilet/Tankless Units
- Efficient Showerheads
- Gravity Driven Boiler
- Efficient Lighting

Special thanks to Blair Wilson and the Board of Directors of Innovation Towers II.

Case Studies

RADIO FREQUENCY BASED HIGH TEMPERATURE SHORT TIME PASTEURIZATION SYSTEM

Designed by: Kostasios Karagiannis, Hristina Stoyan, Anastasia M. Sotiropoulou; Advisor: Dr. Gopal Mehta; Co-Advisor: Dr. Paraskevas Patsouras

I. Background:

The existing commercial heating of milk (HTST) pasteurization method is a well-established technology. However, it is a high energy consumption process and the different temperatures and times used for different products are not optimal. The objective of this research is to develop a new pasteurization system that is more efficient and uses less energy.

II. Objectives:

Design a heating system which will reduce the energy consumption and will be more efficient than the existing HTST system. The system will be designed to pasteurize milk at a higher temperature and for a shorter time.

III. Principle of Operation:

The principle of operation of the system is based on the use of radio frequency (RF) energy to heat the milk. The RF energy is applied to the milk through a set of electrodes. The heat is generated throughout the volume of the milk, resulting in a more uniform heating process.

IV. Methodology:

The methodology used in this research involves the design and construction of a pasteurization system. The system was tested using milk at different temperatures and times. The energy consumption and the quality of the pasteurized milk were measured.

V. Results:

The results of the research show that the new pasteurization system is more efficient than the existing HTST system. It uses less energy and pasteurizes milk at a higher temperature and for a shorter time.

Case Studies

PHYSICAL MODEL OF THE CIRCULATORY SYSTEM

Team: Anthony Amendola, Lector Li, Monika Morones and Cynthia Pao; Faculty Advisor: Dr. Gordon Hayward

Abstract:

The purpose of this project was to create a physical model of the human circulatory system. The model was designed to simulate the flow of blood through the heart and the major blood vessels. The model was constructed using clear plastic tubing and a pump to represent the heart. The flow rate was measured at different points in the system.

Introduction:

The circulatory system is a complex network of blood vessels that transport oxygen and nutrients to the cells of the body. It consists of the heart, which pumps the blood, and the arteries, which carry the blood away from the heart. The veins carry the blood back to the heart.

Design Objectives:

- To create a physical model of the human circulatory system.
- To measure the flow rate of the blood at different points in the system.
- To compare the flow rate of the blood in the arteries and veins.

Methodology:

The methodology used in this project involves the construction of a physical model of the circulatory system. The model was constructed using clear plastic tubing and a pump to represent the heart. The flow rate was measured at different points in the system using a flow meter.

Results:

The results of the project show that the flow rate of the blood is higher in the arteries than in the veins. This is due to the higher pressure in the arteries. The flow rate also increases as the distance from the heart increases.

Case Studies

Critical Attributes of Poster Presentations

- **Clarity:** Deliver coherent and effective message
- **Readability:** Legible from 4-5 ft away
- **Brevity:** Get your point across using as few words as possible without sacrificing clarity
- **Layout & Design:** Looks are important. Do not make it too fancy, though, and avoid a cluttered look
- **Content:** Poster content should be engaging and original, well planned, and thoroughly researched