

EVERYTHING YOU'VE EVER WANTED
TO KNOW ABOUT

Preparing for the ASE Symposium

...BUT WERE AFRAID TO ASK.



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Use the following QR Code to access Additional Resources on the ASE Current Intern web page:



SYMPOSIUM PREPARATION CHECKLIST

Beginning to prepare for the Symposium now is essential to your success. Take it step by step. Try setting small goals each week. Begin outlining the content of your poster modules next week, and take it from there. As you get ready, use the following checklist as a guide.

3-4 WEEKS BEFORE

- Invite your mentor and co-mentors
- Invite parents, grandparents, siblings, friends, neighbors, teachers
- RSVP to ASE so we know who is attending
- Finalize your symposium title with your mentor and submit to ASE
- Start planning your poster and outlining your presentation

2 WEEKS BEFORE

- Share your outline presentation with your mentor and let him/her critique it
- Work on your poster and your PowerPoint presentation
- Avoid poster titles that are long and complicated
- Your poster will be attached with binder clips to a stand, therefore **please verify that your exhibit is no more than 3 feet wide, and is NOT cardboard or foam core board. A common standard dimension is 36 x 48"**
- Make sure that your poster includes your name, the name of your mentor, the mentor organization and logos for both your mentor organization and Saturday Academy

1 WEEK BEFORE

- Ask your mentor to look over your poster before it is finalized
- Conduct dress rehearsals with your mentor, family, and friends
- Verify that your presentation takes no more than 12 minutes (or 24 minutes if co-presenting with another intern)
- Review and organize your visual aids. Is your PowerPoint presentation ready? Is the video you are showing ready to go? Do you need notes?
- Please bring your PowerPoint presentation on a thumb drive.** You will load the presentation on a computer in your presentation room before the Symposium starts. You can also bring your own laptop, but these can take longer to set up. Let the ASE staff members know if you plan to use your own laptop.
- Prepare any "show and tell" items you plan to present.

ATTEND THE SYMPOSIUM

- Dress in your best business attire (**no T-shirts, shorts, or non-dress sandals**)
- Arrive to Symposium on time
- Bring your poster and other presentation items
- If you need a computer during the poster session, bring your own (don't forget cables, software, a power strip and an extension cord with a 3-prong plug).

The ASE web site, <https://www.saturdayacademy.org/about/events/ase-symposium> , will have a final conference program, including intern speaking times posted before the Symposium.

ABOUT THE SYMPOSIUM

The Symposium is the final major event of your ASE summer program. It represents the culmination of your summer internship activities. All ASE interns will convene at a college campus for one day to share their eight-week summer work experiences. Each of you will present your summer's work through a poster session and a 12-minute oral presentation to other interns, mentors, parents, teachers and special guests.

The Symposium is the critical learning event of the summer. It requires you to organize and synthesize your eight weeks of work. You'll learn to present a concise overview of the technical area in which you worked, and you may learn new skills, like how to prepare a multimedia presentation, along the way. This enrichment activity is designed to broaden your exposure to areas of science and technology, improve your speaking and presentation skills, and help you continue networking with your fellow ASE interns.

Your ASE Symposium Responsibilities

Before

- Submit the title of your presentation by the requested due date.
- Request special technical equipment in advance.
- Prepare your poster and 12 minute talk (this is HOMEWORK).

During

- Each intern will display a poster. Even if you are presenting your talk with a partner, you must each create a separate, unique poster.
- Each intern will give a 12 minute talk. Interns presenting with a partner each speak 12 minutes. A presentation for two partners will include a total of 24 minutes of speaking with a 6 minute question period.
- Each intern will attend other presentation sessions when s/he is not giving a presentation.
- Each intern must dress appropriately in business or business casual attire.

THE POSTER

The purpose of the poster is to attract and inform. Your visual display should challenge onlookers to want to know more about your internship, the field in which you worked, and the projects you may have completed during your internship. You might think of yourself as being inside your own poster, looking out at the onlookers and providing them with enough information to make them want to ask you questions and learn more about your topic.

Photographs, graphics, and tables, along with written text, can help accomplish this. A well-thought-out and interesting title can also attract attention. You should be proud of your poster; it should represent you, your mentor, and your mentor's organization in a professional manner.

Advantages of Posters

- On display when you're not
- Make effective use of graphics
- Provide catalyst for discussion
- Display same material as your talk

Neatness, completeness, and clarity are very important. The poster should help you to present your internship work logically and serve as a prop for you to illustrate and discuss what you have done.

There are two types of posters that are appropriate to show at the Symposium: the “Classic Scientific” poster and the “What I Did This Summer” poster. The type of poster you choose will depend on the nature of your internship. If you worked with your mentor researching or focusing on a specific problem or question, then you will want to use the “Classic Scientific” format. If your internship did not focus on a specific research project, then you will want to use the “What I Did This Summer” format. The details for creating each type of poster are discussed below.

THE CLASSIC SCIENTIFIC POSTER

The “Classic Scientific” poster consists of a title, abstract, introduction/hypothesis, as well as sections for your methods, results, conclusions and acknowledgments. As you begin to plan each section keep the following ideas and guidelines in mind.

TITLE

Your title should describe what you did and serve as an attention grabber to make someone want to know more about your work. You can use the same title as you used for your oral presentation, provided it is short. The print for your title should be larger than the text print. Use an easily readable font for your title. You should include your name below the title, as well as your mentor’s name, your mentor organization and your mentor organization logo. You can also include the Saturday Academy logo here – if you don’t include it with the title, please include it in the Acknowledgments section.

The “Classic Scientific” Poster

- Title
- Abstract
- Introduction & Hypothesis
- Methods & Experimental Design
- Results
- Discussion & Conclusions
- Acknowledgments

ABSTRACT

The abstract is a short paragraph (200 words or less) that summarizes your project. Begin with the purpose of your project (what you studied and why), and include a brief overview of your procedures, main results and discussion. It is a good idea to end your abstract with one sentence that states your conclusion.

INTRODUCTION/HYPOTHESIS

The introduction is usually one or two paragraphs in which you address the one or more of the following:

- What was the source of the research or project topic?
- What was the precise purpose of your project? Define your main hypothesis. The hypothesis is a concise statement of your predicted outcomes. This is something you most likely discussed with your mentor as you were planning your research. The hypothesis lets the viewer know exactly what you expected before your experiment began.

- Why was your work conducted? How does it fit into the big scheme of things (broader scientific picture)?

A strong introduction will show a considerable understanding of the prior research and work done by others that has lead directly to the work that you have undertaken with your mentor.

METHODS & EXPERIMENTAL DESIGN

This section of your poster provides a summary of each step you followed when conducting your experiment or project. It answers one question: how did you test your hypothesis? Rather than listing the minute details of each step you followed, it is best to provide an overview of your process. Diagrams and flow charts that illustrate the steps of your procedures are effective, as are pictures of you conducting the procedures. You might want to list materials you used and include diagrams or photos of any special equipment.

RESULTS

This section of your poster is strictly a presentation of the data gathered during your experiment or project. Rather than presenting a lot of raw data, use tables, charts, and graphs to illustrate your overall results. Make sure all items are labeled properly with headings and units (label graph axes). If you conducted statistical analysis while analyzing your data, you should include your statistical results here as well.

DISCUSSION & CONCLUSIONS

This section of your report explains how you interpreted your data. What did the results mean? What conclusions can you draw from them? Make sure you refer back to your original purpose and hypothesis when discussing your findings. Tell the viewer what your findings mean in the big scheme of things, and discuss how your findings will be applied or used for future research. Remember to discuss your failures as well as your successes. Experimental “failures” often provide interesting information that will influence the direction of future research.

ACKNOWLEDGMENTS & RECOGNITION

Please include a brief statement recognizing your mentor, mentor organization, Saturday Academy and anyone else who contributed to your internship. Please include the Saturday Academy logo on your poster either near the title or in the Acknowledgments section.

THE NARRATIVE OR “WHAT I DID THIS SUMMER” POSTER

If your internship did not involve a specific project or research area, then you’ll want to make a “What I Did This Summer” poster. This style of poster will allow you to display information regarding the career area you explored, as well as information about new skills and information you learned.

INTRODUCTION OR BACKGROUND

The introduction consists of a few paragraphs that provide the viewer with an introduction to your internship’s field of study.

The “What I Did This Summer” Poster

- Introduction
- Methods or Procedures
- Future of The Field
- Acknowledgments

Describe the areas of your mentor's organization that you have been exposed to. Discuss the ways that your mentor's organization is involved in the community. Describe some of the practical uses of the knowledge or technology being developed by people in this field. Keep your discussion brief since you will provide more details in the next section. You may want to illustrate your introduction with a flowchart or diagram that helps the viewer visualize how the career area you explored fits into the larger scheme of other fields of work, a larger organization or the community.

METHODS OR PROCEDURES

This section of your poster should explain what activities you did during your internship and why each was important. If you learned many things or were involved in several areas of work, then you may want to use sub-headings to make this section more readable. Provide an overview of each portion if you use sub-headings. Again, diagrams and flow charts that illustrate the steps of processes you learned, or that show how each area of the field are related are effective, as are pictures of you conducting your work.

FUTURE OF THE FIELD

This section of your poster discusses the future of the career area you have explored. Where is this line of work heading? Are there new areas of expansion or new products or projects that are under development? What employment prospects are there for others interested in this field? Where do you believe your experience will take you next and how do you think you'll benefit from your exposure to this industry or career area?

ACKNOWLEDGMENTS & RECOGNITION

Please include a brief statement recognizing your mentor, mentor organization, Saturday Academy and anyone else who contributed to your internship. Please include the Saturday Academy logo on your poster either near the title or in the Acknowledgments section.

MAKING THE POSTER

POSTER HINTS

1. Arrange your display effectively
2. Make your exhibit modular
3. Use borders (or double mount) pictures, graphs, charts
4. Use a high quality printer, space your text, and use BIG, BOLD print
5. Use the same visuals for your poster and talk
6. Use color and pictures
7. Use Saturday Academy approved logo

START NOW!

Your own creativity will determine how you set up your poster. One common choice is to use a poster with the standard dimension of 36 x 48". **Be sure it is no more than 3 feet wide, and is NOT**

cardboard or foam core board. (Your poster will be attached with binder clips to a stand.) Read the rules that govern what can and cannot be exhibited before you begin planning your poster. You will find these listed on the back page of this packet. Also make sure the text includes the name of your mentor, the mentor organization and your name. **Each intern must create their own, unique poster (even if doing a talk with a partner).** When you're ready to begin, keep the following hints and guidelines in mind.

ARRANGE YOUR DISPLAY EFFECTIVELY

The poster should be balanced and organized in a logical, sequential order. Determine in advance what you will display and how it will be organized, and arrange the poster in several ways before attaching all of your materials, or sending your poster to the print shop. (You can even print out a letter size draft to evaluate font size, color choice, and layout.) Keep background spaces to a minimum. Keep it simple. Make it easy for the audience to assess what you have done. Remember that a smaller size poster that is nicely laid out and tells the story is far more attractive than a large one that is not filled. The diagram below represents one type of poster layout scheme. **You must include the Saturday Academy logo (jpeg file) somewhere on your poster!**

MAKE YOUR EXHIBIT MODULAR

Modular exhibits consist of separate pieces of text, visuals and photos. The modular method is useful because it allows you to create each module and then easily rearrange them as you plan your layout. If you continue your project, your poster is easy to update by adding, deleting, or editing the modules.

USE BORDERS OR DOUBLE MOUNT YOUR VISUALS

It is best to use borders with visuals, charts, graphs, and other illustrations (or if you will not be using a print shop, double mount pictures with a border of colored construction paper). By framing your visuals they will stand out from the modules that contain text only.

USE BIG, BOLD TEXT AND HIGH QUALITY PRINTING FOR YOUR FINAL VERSION

Use a high quality printer when you're ready to print out your final version. If you don't have access to a high quality printer at home or through your mentor, they are available at copy centers. Remember: get it perfect first and then pay to print it.

Your title and section headings on your poster should be large enough to be easily read from six feet away. **The title should be at least one inch (72 point) in height. Sub-titles and headings should be 24 point or larger.** Titles, headings, and sub-titles should be typed in an easily readable font.

All other lettering on your poster should be in 18 point font size. As a rule of thumb, most text on your poster should be readable from a distance of about 3 feet. Easily readable fonts are recommended for blocks of text.

CREATE SET OF VISUALS FOR BOTH POSTER AND ORAL PRESENTATIONS

You can use the visuals from your poster in your oral presentation. Make sure that you keep hard copies or computer files of the text and graphics modules that you create for your poster. These items can easily be used in PowerPoint slides to help illustrate your talk. When you are creating visuals, remember to correctly and clearly label graphs, diagrams, and tables. Make certain that graphs have a heading and clear, accurate labels on both axes.

USE COLOR & PICTURES

Use pictures and color to attract people to your poster and enhance your display. Use photographs and digital images to illustrate parts of your project or internship that would be difficult to explain, or that would require time or a lot of text to explain. Pictures can often help you show what you have used and thus you do not need a lot of equipment at your display. Make certain that photographs are accompanied by a one to two sentence description.

Choose contrasting colors for lettering by printing dark letters on a light background. Avoid flashy color mixtures. Instead, use color combinations that are pleasing to the eye and that complement your pictures and other visuals.

START NOW!

The more time you give yourself to work on your poster, the better it will be. Remember: your poster will represent you, your mentor, and your mentor's organization. Make it something that everyone can be proud of. To begin, gather your references, lab book, and other data. Sit in a quiet place with a large surface so you can spread your materials. Make a rough outline with a few words or statements under each heading. At each point, make a note of the visuals you might want to use. You might want to include quick sketches of the visuals you plan to create. This is a great way to get started, and you'll quickly see how much information you have gathered over the weeks from your internship that you'll want to share with others.

ADDITIONAL POSTER DESIGN RESOURCES

Washington NASA Space Grant Consortium website article, "The Basics of Poster Design":

http://www.waspacegrant.org/for_students/student_internships/wsgc_internships/posterdesign.html

Swarthmore College website article, "Advice on Designing Scientific Posters":

<http://www.swarthmore.edu/NatSci/cpurrin1/posteradvice.htm>

North Carolina State University website article, "Advice on Designing Scientific Posters":

<https://projects.ncsu.edu/project/posters/>

DURING THE POSTER SESSION

Once the poster session begins, you should stand near but not directly in front of your poster. Remain near your poster for the entire 30-minute session. Stay focused on your audience: the people circulating through the room viewing posters. Engage your audience by making eye contact, smiling and greeting them. Poster viewers might wish to stop and read your materials, and some will be interested in learning more. Be prepared to answer questions about the information presented in your poster or your internship in general. People who attend the ASE poster session include members of the general public (who don't have much science background), high level scientists and everyone in between. Questions that are regularly asked include "Given the results of your research, what would be the next logical research question or project?" and "What do you intend to do next?" If you don't know the answer to a question, it's fine to say that. Getting the other person talking is often a way to make the interaction more comfortable. Feel free to ask interested viewers about their own background and what their interests in your poster are.

SAMPLE POSTER



Southern Flounder Exhibit Temperature-Dependent Sex Determination

J. Adam Luckenbach*, John Godwin and Russell Borski
 Department of Zoology, Box 7617, North Carolina State University, Raleigh, NC 27695



Introduction

Southern flounder (*Paralichthys lethostigma*) support valuable fisheries and show great promise for aquaculture. Female flounder are known to grow faster and reach larger adult sizes than males. Therefore, information on sex determination that might increase the ratio of female flounder is important for aquaculture.

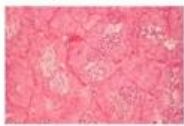
Objective

This study was conducted to determine whether southern flounder exhibit temperature-dependent sex determination (TSD), and if growth is affected by rearing temperature.

Methods

- Southern flounder broodstock were strip spawned to collect eggs and sperm for *in vitro* fertilization.
- Hatched larvae were weaned from a natural diet (rotifers/*Artemia*) to high protein pelleted feed and fed until satiation at least twice daily.
- Upon reaching a mean total length of 40 mm, the juvenile flounder were stocked at equal densities into one of three temperatures 18, 23, or 28°C for 245 days.
- Gonads were preserved and later sectioned at 2-6 microns.
- Sex-distinguishing markers were used to distinguish males (spermatogenesis) from females (oogenesis).

Histological Analysis

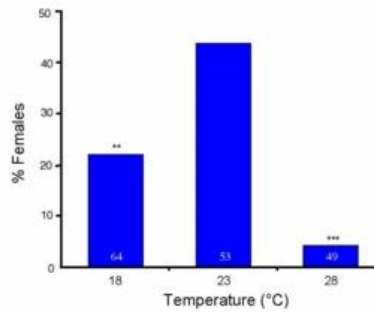


Male Differentiation



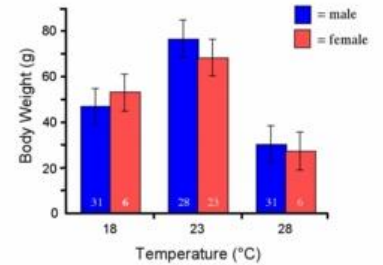
Female Differentiation

Temperature Affects Sex Determination



(**P < 0.01 and ***P < 0.001 represent significant deviations from a 1:1 male:female sex ratio)

Growth Does Not Differ by Sex



Results

- Sex was discernible in most fish greater than 120 mm long.
- High (28°C) temperature produced 4% females.
- Low (18°C) temperature produced 22% females.
- Mid-range (23°C) temperature produced 44% females.
- Fish raised at high or low temperatures showed reduced growth compared to those at the mid-range temperature.
- Up to 245 days, no differences in growth existed between sexes.

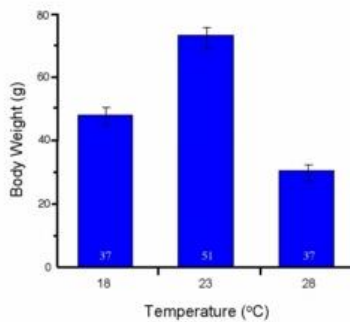
Conclusions

- These findings indicate that sex determination in southern flounder is temperature-sensitive and temperature has a profound effect on growth.
- A mid-range rearing temperature (23°C) appears to maximize the number of females and promote better growth in young southern flounder.
- Although adult females are known to grow larger than males, no difference in growth between sexes occurred in age-0 (< 1 year) southern flounder.

Acknowledgements

The authors acknowledge the Saltonstall-Kennedy Program of the National Marine Fisheries Service and the University of North Carolina Sea Grant College Program for funding this research. Special thanks to Lea Ware and Beth Shimps for help with the work.

Rearing Temperature Affects Growth



THE ORAL PRESENTATION

At the ASE Symposium, each intern will give a 12 minute oral presentation. Each presentation will take place in a “break-out” room with an audience of around 10-30 people. If you worked closely with another intern on the same project or tasks, then you may give a single presentation together. However, each person is expected to speak for 12 minutes (that means teams of 2 will be assigned a 24 minute time slot with a 6 minute question period). The oral presentation is your opportunity to explain your project to another person —another intern, a parent, a teacher or a mentor. **Please keep your Symposium title short!** During the presentation, you’ll want to include a description of each part of your internship or project and explain your research in enough detail so the audience understands what you did, how you did it and what you learned. Keep in mind that your audience is likely to include people without technical expertise, as well as those with higher levels of expertise. In order to communicate well with both groups, be sure that your presentation is logical and easy to follow. Make your message clear. Below are some key points to consider when preparing your presentation.

OUTLINING YOUR PRESENTATION

Think of your talk as an oral version of the information you are displaying on your poster. You’ll start by telling the audience who you are and follow by introducing your topic and hypothesis, explaining your procedures and results, and discussing your conclusions. If you didn’t focus on a specific project or research problem during your internship, then your talk will follow the format of the “What I Did This Summer” poster. During the oral presentation, you’ll end your talk by acknowledging those who assisted you during your internship and asking “Do you have any questions?”

Once you have outlined your presentation (remember to use your poster modules as a guide), **take the outline to your mentor and let her/him critique it.** Come to an agreement on what should be included and then work on refining your outline. Do not write the talk out word for word. The best talks usually come from the briefest outlines.

CHOOSING YOUR VISUALS

Visuals (and color) add a lot to a presentation. As with your poster, including graphs, tables and other illustrations will help explain your procedures and results. Use good judgment in determining the number of visuals you use and try to balance their contents (some text, some graphics). Don’t overwhelm the audience with too many graphs. Although you do not want to quickly flash through multiple visuals, you should not spend too much time on a single visual either. Visuals should be large, simple, and uncluttered. Focus on

Types of Visual Aids

- Text slides listing key points you are presenting
- Data tables, charts, and graphs
- Diagrams, flowcharts, illustrations
- Photos of facilities, instruments, people, animals, etc.

ANY VISUALS CREATED FOR YOUR POSTER!

important information. Each visual should make one simple statement and supplement what you are saying while the visual is on the screen.

Keep in mind that your audience might or might not be familiar with your topic, so avoid jargon or technical terminology that audience members with less expertise will not understand. If it is essential to use specialized terms, remember to explain them briefly. You may also need to interpret visuals for your audience. For example, when showing a graph, remember to name the variables on each axis and highlight the important features of the graph. Do not read each number in the table or figure. Call attention instead to the important points.

GUIDELINES FOR CREATING VISUALS

At the Symposium you will have access to a digital projector and a computer. Most students use PowerPoint presentations. If you wish to include visual aids that require different technology, please contact the ASE staff to see if we can accommodate. Whichever format you choose, it is important to remember that content is much more important than fancy visual aids. Your bells and whistles won't mean much to your audience unless the content is clear, purposeful and well explained. As you prepare your visuals, keep the following guidelines in mind.

Use color and background designs that will heighten interest in your talk and support the theme of your presentation (for instance, if you worked at an aquarium, perhaps blues and greens would make a nice background). You want color and design to enhance the content of your visuals so make sure there is plenty of contrast between the background and any text or graphics you are using. You don't want your audience to squint, so use BIG, BOLD print. Be sure that all information is readable from a distance and pay attention to point size and line spacing. Most importantly, check your spelling!

Visuals, Texts, & Graphics Should Be:

- Readable from a distance
- Not obscured by too much color or design
- **BIG, BOLD**, and adequately spaced
- Spelled correctly!

PRACTICING YOUR PRESENTATION

The most important key to a successful oral presentation is plenty of practice. Go into a room alone with your outline and your visuals. Stand up straight, decide on an opening sentence or two and memorize them. Speak aloud even though no one can hear you. Stop and start over as often as necessary to make it sound right. Practice while using your visuals and equipment as you talk. As you practice, pace yourself. The natural tendency when we speak in front of others is to speed up. **SLOW DOWN.** Deliver your presentation at a comfortable pace. Time yourself and make cuts in content if necessary to keep your talk at 12 minutes. Practice the talk until you are comfortable with it.

Your Key to Success

- Practice
- Practice Again
- **Practice Again & Again**

Finally, work with audiences who will listen and give you feedback on your presentation. Practice in front of people who know your topic well (like your mentor, co-mentor or fellow intern). They can check for technical accuracy and give you valuable feedback. Practice in front of people who don't know the topic (like family members or friends) to make sure your talk is understandable. Take note of any questions they ask. This will help you anticipate questions that you may be asked by your Symposium audience.

DELIVERING YOUR PRESENTATION

Once you're at the Symposium and you've found your presentation room, mentally review what you learned while preparing and practicing your talk. Do not read your presentation to your audience. You should have practiced enough so that reading is unnecessary. Rely on your outline and your visual aids. You have worked hard and know more about your project and internship than anyone else. That makes you an expert!

Be positive and confident of your work. Look interested in what you are doing and present your work enthusiastically. Make eye contact with your listeners during your presentation. Leave gum at home.

Dress professionally and neatly and wear comfortable shoes (you'll be on your feet a good portion of the day). You should wear clothes that are clean, wrinkle-free and suitable for a nice event. Dress in "business attire," which includes dress slacks, a dress or skirt, a blouse or dress shirt and nice shoes. No t-shirts or sneakers.

Remember that you are representing yourself, your mentor, and your mentor's organization at all times. Once you've finished, answer all questions that you can. If you are not certain of an answer, you might say, "I'm not certain, but I think it might be.....". You might ask the presider in the room if he or she knows and could help you.

ADDITIONAL PRESENTATION RESOURCES

University of Virginia article, "How to Make an Oral Presentation of Your Research": <http://undergraduateresearch.virginia.edu/present-and-publish/presentation-tips>

Mathematical Association of America *Math Horizons* article, "Advice on Giving a Good PowerPoint Presentation": <http://www.d.umn.edu/~jgallian/goodPPTalk.pdf>

Tips for Giving Your Talk

- Speak up and project your voice
- Establish individual eye contact with your audience
- Don't read your presentation—know it well enough so you can speak while looking at your audience
- Stand straight, smile, move around a little, have a good time
- Don't make distracting movements with your hands
- Remember: the audience supports you; the Symposium is not a competition!

ASE DISPLAY & SAFETY REGULATIONS

The following items are not allowed on your poster or at your display (these are standard science fair display regulations):

1. Living organisms (plants, animals, microbes).
2. Taxidermy specimens or parts, and preserved vertebrate or invertebrate animals.
3. Human/animal parts or body fluids (for example, blood, urine) (Exceptions: teeth, hair, nails, dried animal bones, histological dry mount sections, and completely sealed wet mount tissue slides).
4. Plant materials (living, dead or preserved) which were part of the scientific experimentation and which are in their raw, unprocessed, or non-manufactured state.
5. Laboratory and household chemicals, poisons, drugs, controlled substances, hazardous substances or devices (for example, firearms, weapons, ammunition, reloading devices).
6. Dry ice or other sublimating solids.
7. Sharp items (for example, syringes, needles, pipettes, knives), flames or highly flammable materials.
8. Batteries with open-top cells.
9. Photographs or other visual presentations depicting vertebrate animals in surgical techniques, dissections, necropsies, or other lab procedures, improper housing conditions, etc.
10. Interns requiring 120 or 220 Volt A.C. electrical circuits must provide a UL-listed 3-wire extension cord which is appropriate for the load and equipment.

BEYOND YOUR INTERNSHIP

You've just spent eight weeks learning about a new area of science and developing new technical and professional skills. Rather than viewing the Symposium as the end of your internship, why not view it as the beginning of your involvement in science and research? If you conducted a research project as part of your internship, you might want to enter your work in a science fair or other research competition. If you did not focus on a specific research problem, you might want to pursue this type of activity during the coming school year. There are several science fairs, symposia, and other science competitions that may interest you. We have listed several such events below along with their web addresses so you can find out more.

Oregon Jr. Academy of Science and Jr. Science & Humanities Symposium

<http://www.jshs.org/>

Intel Northwest Science Expo – Oregon Students

<http://www.nwse.org/>

Washington State Science & Engineering Fair

<http://www.wssef.org/>

Regeneron Science Talent Search

<http://www.societyforscience.org/STS>

Be sure to check out the Student Resources page on the ASE website for additional resources, including scholarships, internships and even more competitions.

<https://www.saturdayacademy.org/ase-student-resources>