

# Strategies for Creating a Conspicuous, Effective, and Memorable Poster Presentation

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## INTRODUCTION

Many of the major geoscience conferences are experiencing increased attendance, making it impossible to feature all oral presentations. Hence, the number and value of poster presentations are on the rise. For example, during the past 10 years, posters consistently comprised ~66% of the presentations at the American Geophysical Union (AGU) Fall Meeting, but overall poster numbers grew rapidly and now represent thousands of presentations each day (Fig. 1). Similarly, the European Geosciences Union (EGU) General Assembly is now made up of 66% poster presentations, also resulting in thousands of poster presentations each day. Posters at the Geological Society of America (GSA) Annual Meeting comprised an average of 37% of presentations during the last decade.

In light of the increasing number of posters at large geoscience conferences, authors must work hard to give conspicuous, effective, and memorable poster presentations. In all the chaos of the poster hall at large conferences—socializing, searching for beverages and bathrooms, and the hundreds to thousands of simultaneous presentations—you have a lot of competition for people’s attention. Here, we provide a “road map” of strategic steps for presenters who want their science to stand out among the rising sea of posters. We also point out some key open-access resources that will further improve posters when paired with these strategies.

## CONTEXT: ORAL VERSUS POSTER PRESENTATIONS

Oral and poster presentations are very different formats in terms of preparation, execution, and professional interaction. Oral presentations provide an opportunity to *disseminate* well-developed scientific findings or hypotheses within a short time-frame (10–20 min.), followed by a brief question and answer period (2–5 min.). The oral presentation format does not allow much social interaction or opportunity to receive immediate insights about your research from the community. On the other hand, posters allow you to *give and receive* in-depth information and feedback about your research. The poster presentation is social and enables extended professional interactions that can

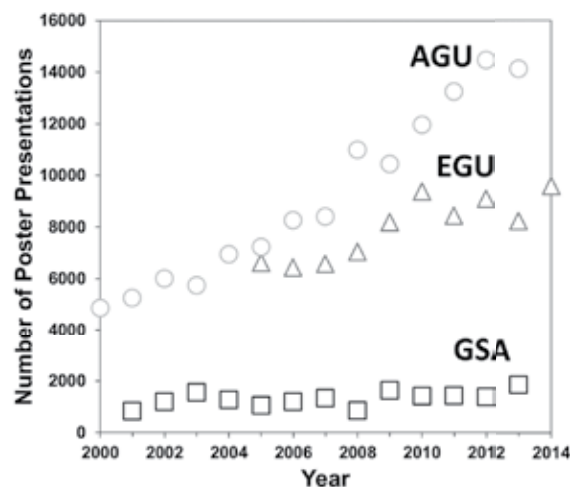


Figure 1. Number of recent poster presentations for three major geoscience conferences: GSA Annual Meeting, AGU Fall Meeting, and EGU General Assembly. Data provided by GSA, AGU, and EGU.

greatly benefit your research and career. Thus, posters deserve much respect and care in their creation and delivery, and should not be considered second-class presentations.

## PREPARING TO CREATE THE POSTER

### Choose a Meeting Session Carefully

Submit your abstract to an appropriate session by anticipating the audience that you want to attend your poster. Use your knowledge of the topic and your network (peers, colleagues, and mentors) to help you choose a session. This can be achieved by searching for keywords and convener names in the session descriptions of most meetings.

### Be Strategic in Choosing a Title

Your presentation title is very important and should be selected carefully. Many people will decide to attend your presentation based upon the title alone. Make sure your title is concise and precise. A title that states the key findings can be a powerful draw

(Hess et al., 2011). If appropriate, you can enhance your title and make it visible to a broad spectrum of people by using keywords that link your work to major issues or debates in your field of geoscience.

### Formulate Your Poster Storyline

Before starting poster design and construction, you should formulate your storyline with the “give and receive” opportunity in mind. For example, include data and findings that you want to discuss because they either support your ideas or perplex you. Although guidelines may vary by meeting, an organized poster in the geosciences usually follows the format of a scientific paper: introduction, methods, results, discussion, conclusions, references, and acknowledgments. Again, remember to anticipate your audience. Make your presentation relevant and tangible to this group of people. For example, if you know that the session audience will be less quantitatively oriented, you should use model schematics instead of systems of equations.

## MAKING THE POSTER

### Follow the Guidelines

Always know the conference regulations and obey them. Pay particular attention to allowable dimensions, because they vary between GSA, AGU, and EGU. This easily avoidable mistake is probably one of the most frequently made. You do not want to show up and realize your poster is intruding on your neighbor’s space.

### Use Appropriate Formatting

The layout and formatting of your poster content is immensely important. You must obey guidelines for the inclusion and style of text and figures (e.g., amount of text, minimum font sizes, figure resolution, visualization design, and color selection). This topic is discussed thoroughly in other resources (see these open-access references: Miller et al., 2002; Faulkes, 2011; Hess et al., 2011; Purrington, 2011). Use these resources to avoid the cardinal sins of poster design and formatting (e.g., fonts and figures that are too small). In general, less is more when it comes to posters, especially for text. The most effective posters contain only the most fundamental and interesting material from the study (Hess et al., 2011). Your poster does not need to contain all the details, because you will be at the poster to enhance the presentation.

### Create a “Brand” That is Memorable and Visually Appealing

Keep an eye out for engaging and inspiring designs—you do not have to reinvent the wheel, but you do want to find a functional, reproducible design that can become your “brand.” There are effective and ineffective posters all around you (e.g., in your institution’s hallways), so learn from these examples and Web resources (e.g., Faulkes, 2011, Hess et al., 2011, Purrington, 2011). Rather than copy a specific format, pick and choose pieces of style and design that appeal to you, while avoiding common design pitfalls.

### Get Coauthor Support

Make sure all of your coauthors review and approve your poster prior to printing. Build this step into your schedule so that there is time to include their valuable input.

## PREPARING TO PRESENT THE POSTER

### Practice

Always rehearse the “walk-through presentation”—your 2–3-minute oral presentation of your poster—with your peers and colleagues. Rehearsal will immensely improve your delivery at the conference. Get and incorporate feedback from your peers and colleagues. You are likely to give this walk-through many times during your session; deliver it with enthusiasm every time.

### Provide Handouts

Bring “mini-posters”—letter-sized versions of your poster. Make sure your poster content is still legible in this smaller format. If it is not, your text and figures are probably too small on your full-size poster. Make these mini-posters available by your poster and carry some with you so that you can hand them out at opportune times. If applicable, it also helps to have supporting materials on the back of your mini-poster (e.g., additional figures, equations, or a list of your related publications). These mini-poster handouts also serve as valuable reminders for people to follow up with you.

## PROMOTING AND PRESENTING YOUR POSTER

### Self-Promote and Be Outgoing

Enlist help from peers, colleagues, and advisors to send folks your way before and during your session. Coordinate with colleagues who present before you to advertise your poster during their poster or oral presentation—and then do the same for those presenting after you. Most people wait for you to engage them at your poster, so be outgoing and welcoming. An easy first step to engaging someone is to smile and make eye contact. You do not want to spend many hours standing alone, especially after you have invested the time and money to attend the conference. Science is fundamentally about sharing ideas, and these social interactions are necessary for advancing science.

### Hook Your Audience

When new audience members arrive, introduce yourself with your affiliation. Make sure to note their names and briefly learn about their research. Ask them if they would like the “walk-through” or have questions. Connect your research to the interests of the audience quickly so as to “hook” them. During your walk-through, always start broad and work toward specifics, while gauging your audience’s level of knowledge on the topic and adjusting your presentation accordingly. It helps to bookend your brief presentation with the motivation for the study, because that is likely the common scientific thread between you and your audience.

### Maintain an Audience

Be interactive with your audience and use questions and frequent eye contact. Continually check in with your audience and make sure they are still engaged. This is very important, because a poster with an interested audience will draw other curious attendees from the crowd and give your science more exposure. Be prepared to take notes on feedback and names, but do this during your breaks so you do not disrupt the flow of your presentation or interactions with your audience. As you part ways

with audience members, always thank them for their thoughts and time. With rare exception, stay by your poster during the entire session to maintain your momentum and audience levels—avoid the temptation to leave early for other talks and posters. This also means not wasting time in the complimentary beverage line during your session; have a peer bring you something (*you have earned it!*).

### Follow Up

After the conference, make sure to continue your interactions. Follow up with those who had a key question or comment. This will expand the impact of your science and reinforce the connection between you and your scientific community long after the conference is over.

### SUMMARY

Here we have provided a road map of strategic steps that will help you create and deliver a poster presentation that is conspicuous, effective, and memorable. These key steps are (1) know and embrace the value of a poster presentation; (2) carefully choose your session and title; (3) create a storyline and format for your poster that facilitates *giving and receiving* information; (4) obey the fundamental published guidelines for formatting the content, text, and visualizations of a poster; (5) practice, practice,

practice the presentation and get feedback before the conference; (6) self-promote and be outgoing before, during, and after your presentation; and (7) appreciate, interact with, and maintain your audience. Execute these steps and you will be an effective communicator and your science will be memorable.

### ACKNOWLEDGMENTS

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