



PROFILE

Caitlin Devor is a science communicator originally from Pittsburgh, Pennsylvania, USA. She writes to excite non-expert audiences about new scientific discoveries and empowers researchers to find their own voices as communicators.

Sharing Science - Writing Outside of Professional Journals



Have a nice day Photo/Shutterstock.com

In this science communication (scicom) series, the Division for Strategic Public Relations will share our recommendations for how UTokyo researchers can share their expertise beyond their professional circle. This series will introduce various forms of scicom that researchers might pursue. Scicom is its own area of expertise. These brief articles will merely introduce the fundamental practical aspects of six forms of scicom and mention additional sources for practice or theoretical background. The forms of scicom included in this series will be using social media (SNS) professionally, public speaking, video or audio recording projects, including your work in museums or other exhibitions, and art or other types of performance. In this first article, let's think about how researchers can write about their subject outside of academic journals.

Why would a researcher write anything other than professional academic journal papers?

Even the most widely read mass media article will not directly boost your h-index value. However, sharing your results with a larger, more diverse audience — particularly an audience of taxpayers whose money enables your research — can be considered a researcher's civic duty. Adapting your research story for the mass media will share your work with more and different types of people than those who read the academic journal article. Your newspaper, magazine, or blog article may be read by politicians, other journalists who might write about your work in the future, or potential interdisciplinary collaborators for

your next project. Moreover, most digital media outlets will include a link to the original journal paper, so experts who read your mass media article might also find your research paper. If you enjoy teaching

or chatting about your work with students or amateur enthusiasts, then writing for the mass media may be a fun form of scicom for you.

Where can researchers write?

The Conversation is a digital outlet that only accepts articles written by experts. In Japanese, SYNODOS is a similar outlet. Many outlets have Op-Ed (opinion) sections for expert commentary on current events. You can receive scicom training and get published by the online magazine Massive Science Consortium and the American NPR SciComms. *Nature* publishes commentaries or blog-style articles by academics in online "communities." Remember that "normal people" and "the general public" do not exist. Every outlet understands its unique audience's average age, income, education, and living location — so, you should too.

Now that you have an outlet and an audience in mind, how can you turn your research into a story?

The COMPASS Message Box and Half-Life Your Message techniques are fast, effective methods for finding the story in your research. The De-Jargonizer is a free online word analysis tool that reveals which words in any text might be unfamiliar to non-experts. Find a news article and compare it to the original research paper to observe these techniques in action. A research story, like any narrative, has a main character, and a beginning, middle, and end. Logical scientific writing styles require that readers understand each detail to understand the whole — it is unrealistic to expect non-experts to be interested in every detail of a discovery that has taken your research group years to achieve.

Audiences do not need to know every detail of your data, but they do want to feel why your work is exciting or important, know how it might affect their daily life or how it could change our understanding of the universe. Zoom out from the minutiae of your results and remember why your research is relevant to society or why you first became interested in the topic. Researchers from all disciplines have told me that non-expert audiences will be disinterested in their work. They are wrong. Large surveys, like the biennial American National Science Foundation's Public Attitudes and Understanding, consistently report that the public is interested in new scientific discoveries.

The next step is to propose, or "pitch," your story idea to an editor. Editors decide if their audience will be interested in your story. Editors will also assess if your pitch is newsworthy. Newsworthy stories will have at least one of these qualities: timely (happening now or related to an annual event); impact (number of people affected or severity of effect); prominence (high pre-existing public awareness); proximity (relevance to the target audience); bizarreness (unexpected or surprising); conflict (disagreement). Conflict need not be physical; new data that contradict research dogma can create dramatic effects when described in a larger research narrative.

If your pitch is accepted, be prepared to go through multiple rounds of editing focused on improving the quality of the story. Journalists usually have very short deadlines (hours, not months). Know that in the mass media, writers of an article usually do not write the headline — this is why headlines can sometimes sound different than the content of an article.

In addition to the training provided by the outlets listed previously, The Open Notebook, SciDev Net, and Poynter's News University are excellent resources for journalism training. The School of Science website's digital version of this article has links to the resources mentioned.