JiTT for Scientific Writing-Overview of the Delivery Structure and Focus for Learning

The Warm-Up Exercise

Students answered seven questions sent by email the week before the workshop. The answers required no research or activity other than to respond to the information and questions given. Students were asked what constituted good scientific writing, to make comments on how to improve a short piece of text provided from another discipline, and for their perceptions of their science writing skills and the evidence for their claims. It was intended that they would spend no more than 15 minutes on their answers.

Key Discussion/ Learning Points:

For students: to make them think about the topic and their needs before the workshop. For the lecturer: to tailor the content and time allocated to themes within the workshop in proportion to students' perceived needs.

The Science Writing Workshop

The Big Picture and Key Words (20 minutes)

In pairs, students take turns to describe the work they have done and are now writing about. The listener summarises the work by noting down information that answers a series of prompt questions on a handout. The students then work in pairs to identify keywords and phrases that collectively summarise the work undertaken.

Key Discussion/ Learning Points:

It is important to have a clear and summary conceptual understanding of your work to be able to keep your writing focused.

Writing and Science Writing (30 minutes)

A lecture to introduce the aims of academic communication, to describe the differences in writing about science for different audiences and the skills that comprise effective writing based on a range of models. The lecturer also shares a summary of the students' comments from the warm-up exercise on what characterises good scientific writing and the students' perceived strengths and weaknesses.

Key Discussion/Learning Points:

Scientific writing is aimed at an educated peer group.

Writing is a craft underpinned by a series of skills.

Knowing this and knowing your strengths and weaknesses allows you to develop the quality of your written work.

Readability (20 minutes)

As a noisy chorus the students read aloud from the draft of their writing. They are told they can only breathe as their punctuation allows. They then undertake a rapid SMOG test to assess the minimum reading age required by the audience for their written work.

Key Discussion/ Learning Points:

Readers need to breathe to stay alive. Good punctuation and sentence structure allows this.

Scientific writing necessarily contains a large number of polysyllabic words and this affects how easy the text is to read.

Readability can be developed by careful use of punctuation and word choice.

Proof-Reading and Editing (40 minutes)

A talk and discuss session based around handouts on the process and value of proofreading and working to improve written work that focuses on ambiguity, conventions, waffle and the importance of effective sentences.

Key Discussion/ Learning Points:

There are right ways and wrong ways (or more accurately, accepted ways and unacceptable ways) to present and write for a scientific peer group. Everyone has common faults in their use of the English language: knowing them is half way to resolving them.

Titles and Abstracts (10 minutes)

A lecture illustrated by examples to show how to present information in the title and abstract to engage and interest a reader in your writing.

Key Discussion/ Learning Points:

Working within conventions to get the attention of a reader.