

**Reducing the Noise Level in Scientific  
Communication: How Services from  
ISI Aid Journal Editors and Publishers**

**Number 30, July 25, 1977**

Have you ever madly twisted a radio dial in an attempt to hear the latest news over the static? Has a blizzard of electronic "snow" ever appeared on your television screen just at the climax of a drama? Have voices on the telephone ever sounded as if they were echoing from the bottom of a very deep well?

If you have experienced any of these inconveniences, you are familiar with what communications experts generally classify as noise. Noise creates errors or stops messages from being delivered entirely. Depending on the nature and importance of the blocked message, noise can be expensive, time-consuming, or even dangerous.

In the scientific journal literature, noise frequently occurs in the form of inconsistent, inappropriate, and outdated editorial practices. I don't mean the natural diversity in style and format that is to be expected and even encouraged, but the kind of editorial aberrations that cause time-

consuming delays and prevent retrieval of vital information.

Reducing noise pollution in science communications has long been a concern at ISI®. I have written articles and letters, campaigned at scientific meetings, and bent the ears of quite a few journal editors to get them to use informative titles and more legible tables of contents. I've stressed the need to include abstracts or summaries for each article, prominently display volume and issue numbers, provide complete author addresses, and number reference citations and place them at the end of the article.

These and other noise-reducing suggestions provided the basis for a large part of a paper which I recently gave at the First International Conference of Scientific Editors in Jerusalem (April 25-29, 1977). The paper is reprinted here for those who would like to be able to judge whether the journals in which they publish are doing the best possible job to assure that all potential readers are made

aware of their papers.

As the title--"How Services from ISI Aid Journal Editors and Publishers"--indicates, the paper touches areas besides how to improve the visibility of journal articles. It also deals with ways editors can help assure the quality of the papers they publish, and why it is economically beneficial to publishers to have their journals covered by secondary information services such as *Current Contents*<sup>®</sup> or *ASCA*<sup>®</sup>. There is even a discussion of why ISI's *Original Article Tear Sheet Service* (*OATS*<sup>®</sup>) actually tends to increase journal subscriptions.

In fact, according to the pricing theory of Professor W.J. Baumol of New York University, if publishers would charge a reasonable amount for reprints, libraries would be induced to order more subscriptions to some

journals. High prices discourage people from requesting the reprints from libraries. If few reprint requests are received for a journal, the libraries see no reason to subscribe to it. However, reasonable charges for reprints would encourage more individuals to request them, so that eventually the library might determine that it is more economical to order another subscription to the journal.<sup>1</sup>

Readers who wish to help ISI in its campaign to improve science communications might send a clipping of the reprint, or a letter which reiterates some of its suggestions, to editors whose journals contribute to the noise level. After all, one can counteract noise by shouting louder than the next fellow. But the most effective way of dealing with noise is to prevent it in the first place.

---

#### REFERENCE

1. Baumol W J. Personal communication, 15 June 1977.