

a necessary degree of freedom from dogma, prejudice, etc.

Various schemes have been proposed to resolve the conflicting functions of scientific journals. Each proposal presumably eliminates the disadvantages of existing methods while retaining the advantages. Some people feel that establishment of "priority" is the most important function of journals, hence the need for "quickies". This feeling is probably more prevalent among younger scientists. More mature scientists deplore the desperate means sometimes employed to establish priority.

Other scientists are more concerned that their publications receive wide distribution. Only the best known journals can accomplish this. An article in *Science* reaches over 100,000 readers. An article in a small journal may reach a few hundred or less.

Interdisciplinary research adds to the complexity of journal publication. Journals like *Science* and *Nature* are increasingly considered a desirable place to publish because most other journals are so highly specialized. One proposed solution to this problem is a daily "newspaper" of science. Another proposal is a depository system. Papers would be listed by title in journals, *Current Contents*, etc. Copies of articles would be obtained from the central depository much the way *Current Contents* readers order *Original Article Tear Sheets (OATS®)*.

Aesthetics is an important aspect of publication not to be ignored and accounts for our persistent desire to publish in journals or books. It gives one a greater sense of pride to distribute reprints of a "printed" paper than a mimeographed or multilithed document prepared by typewriter. Graphic arts improvements may soon change anachronistic attitudes. The office typewriter will soon be able to

produce a document of high aesthetic value.

Finally, there is the question of retrievability. In selecting a journal for publication, retrievability is an important factor. If the journal is covered by abstracting and indexing services this lessens the chance your paper will be buried. If you publish in an obscure journal, your article may be lost to posterity, not only because it has limited distribution, but also because it cannot be found in a reasonable literature search. Many readers have indicated to me a preference to publish in a journal covered by *Current Contents*.

Timing, size of audience, aesthetics, and retrievability are important factors in scientist-to-scientist communication. One would like criticism by one's peers through refereeing, though not at the price of long delays. The prestige of publishing in a well-known journal becomes less important as the importance of priority increases.

Since the above was written,¹ ISI's® *Science Citation Index®* and *Automatic Subject Citation Alert (ASCA®)* system have made practical the assured delivery of critiques of any paper, no matter where published. The increased use of *Current Contents* and systems of selective dissemination of information like *ASCA* have enabled new journals to compete with the larger, established journals.

What has, unfortunately, not happened in the intervening eight years is the complete acceptance by authors and book and journal publishers that they may have to accept part of the cost of indexing their material. While the concept of page charges has been widely adopted, a similar attitude towards indexing and abstracting services has not.

1. Garfield, E. What is a journal? *Current Contents Chem. Pharm. Med. Life Sci.* No. 36, September 8, 1964, p. 5-6.