Editorial Comment

"in simple and understandable language"

The lead article in the September, 1947, issue of *The Teachers' Digest* has some implications for biology teachers. It is entitled "Must Educators Talk in Riddles?" and starts out with a question as to why the speech of some educators in their daily living is so much more sensible than their talk about teaching and learning. The article goes on to say that the educator "writes *dominant* for 'frequent'; *increasingly* for 'more and more'; *integration* for 'unifying,' or making sense out of a mass of material. If he merely mentions something, he says he *places emphasis on it,* or *stresses it.* If he stops to notice something, he calls the act *evaluating.*"

There is some exaggeration in the article, and there is use for words like the italicized ones in the quotation above, but they should be used when necessary to express an exact meaning. So with technical terms in biology; these should be used when, and only when, necessary. Some time ago I received a manuscript suggesting some ways of speeding up the learning time of technical terms in high school biology. There were nmemonics and other tricks, and some of them were pretty fancy devices. But do high school biology students have to learn such words as exumbrella, gametogenesis, haematococcus, heterozygosis, polyploidy, and sclerenchyma, to mention a few examples of terms included? The manuscript was returned with the comment that if these terms stand for ideas that are necessary in high school biology it ought to be possible to find simpler words to express the ideas. A number of years ago I found a sentence from one of my own papers quoted by a well-known magazine. This should have been flattering, but not in this case. The quotation was in an article entitled, "Why Don't Scientists Talk Sense?" and was cited as a horrible example of unnecessarily complicated language. As a partial excuse for the language I may say that the sentence about "the multimodal frequency polygon of temperature characteristic distribution" was in a doctorate thesis and was not intended for Readers Digest distribution. But it could have been written so as to be easier to grasp. Ever since the doubtful honor of the quotation came to my attention, scientific language has been one of my concerns. It is surprising to find that *front* is almost always as good as *anterior* and *mouth* almost always an acceptable substitute for *oral* or *buccal;* why not use the term the student already knows? Any biology teacher can find in his own vocabulary a number of technical terms which add little or nothing to, and may detract from, the ease with which his students can follow him. Most of the students we have in high school biology (or in college biology, for that matter) do not go on into professional biology and will not need many of the technicalities of biology in their future contacts with the science. Such a term as *Protozoa,* which is being used in newspapers and magazines often enough to be almost a common name—OK. But *Porifera,* why isn't *sponge* just as good? Is there any reason why the non-biologist cannot get along with *flatworm,* or must he be taught *Platyhelminthes?*

A recent biology round table which it was my privilege to attend dealt with the objectives of general biology in high school and for the non-science student in college. One of the conclusions was:

"The first objective is to present those biological concepts with which the student will come into contact in his future everyday living, and to present them in simple understandable language." We may quarrel with their placement of this objective in first place, but not with their insistence on "simple understandable" language.

COMMERCIALS

COLOR FILMSTRIPS and color slides, either in sets or in selected orders are produced by the Philp Visual Service. For example, the set *Our State Flowers* may be obtained in a film strip, in ready mounts or bound in glass, with a study guide included. For information and prices write Philp Photo Visual Service, 1218 American Avenue, Long Beach 13, California. *Slidefilms and Motion Pictures—To Help Instructors* is the title of a new catalog of selected visual teaching aids produced and distributed by the School Service Department of The Jam Handy Organization. This booklet lists discussional slidefilm kits, sound slidefilms, and educational sound motion pictures for vocational training and classroom use. All subjects have been selected for timeliness and adaptability to current teaching trends and instructors' needs. Free copies of this new catalog may be obtained by writing to The Jam Handy Organization, 2821 East Grand Boulevard, Detroit 11, Michigan.

KODACHROMES of many of the well known *Turtox Biochrome* biological charts are available; these are convenient to store and are found valuable when projection is easier or more practical than showing the actual charts. More than twenty subjects are available and more are being prepared. For a list and prices write General Biological Supply House, 761-3 East 69 Place, Chicago 37, Illinois.

NATURE GAMES are card games—three of them, *Goldfinch,* a bird game, *Monarch,* a butterfly game, and *Larkspur,* a flower game, are available. Each consists of 60 cards about the size of regular playing cards, with the face side having a colored picture and number of items of information that can be used in a variety of nature games. For information address Nature Games, Box 201, Angwin, California.

NEW SOUND FILMS

Augmenting the world's largest library of new 16 mm. educational sound films in color and black and white, Coronet Instructional Films this week announced completion of four productions, three of which are designed for use in the field of Natural Science, as follows:

Mammals of the Western Plains (1 reel, sound, color or black and white. Collaborator: Colin H. Sanborn, Curator of Mammals, Chicago Natural History Museum). Sweeping across the great western plains of North America, Coronet's camera has vividly captured the story of the area's inhabitants in their natural environment . . . showing students how man has upset the natural balance between herbivorous mammals like the bison, deer, and elk, and such preying carnivores as the timber wolf, cougar, and Coyote. As a striking plea for conservation of our large game animals, this production is of great value to students in general science, nature study, and biology at the upper elementary, junior and senior high school levels.

Mammals of the Rocky Mountains (1 reel, sound, color or black and white. Collaborator: Colin H. Sanborn). Designed to illustrate how seasonal adaptations of mountain animals are correlated with their changing food situation. Beginning near the top of the mountain with the permanent residents—mountain goat and bighorn sheep—the film proceeds downward through the timber, showing mule deer, porcupine, beaver, marmot, and other typical mammals and their varying ways of adapting to seasonal change. This film is intended primarily for use at the same grade levels, and in the same courses as Dr. Sanborn's other study of mammals.

Snakes (1 reel, sound, color or black and white. Collaborator: Dr. Howard Gloyd, Director, Chicago Academy of Science). Not only does this new film develop the idea of what a snake is, but also shows students how