PSYCHOLOGICAL CONCEPTS AND AUDIO-VISUAL INSTRUCTION

C. R. CARPENTER

In this article the author draws upon his years of experience as a psychologist to make an application of psychological concepts to audio-visual instruction. C. R. Carpenter is head of the Psychology Department and director of the Instructional Research Program at Pennsylvania State University.

Purpose

Those individuals who are responsible professionally for using the vast array of audio-visual materials and methods have justification for expecting to find in conceptual systems of the learning processes useful precepts, axioms and principles applicable to their work. It is the purpose of this article to outline some selected but fundamental concepts about learning which should be useful in improving teaching by means of audio-visual materials. The concepts to be presented are selected in terms of their estimated usefulness in preparing, selecting and using audio-visual materials. Controversial theoretical discussions are avoided. Likewise, oversimplified “formulas” and overextended generalizations are avoided.

It is hoped that this article will be a useful, condensed, and meaningful guide for professional audio-visual teachers and administrators who are interested in the persisting and perennial problem of improving the processes of teaching and learning.

Complexity and Variety of Audio-Visual Materials and Methods

Ideally the psychological concepts to be stated should be selected and applied for specific kinds of audio-visual materials. However, the diversity and variety of these prohibit such a detailed treatment. It is not reasonable to expect that the same

1 The article was written while the author was on vacation and away from specific reference material.
psychological concepts will apply in detail, and equally well, to all kinds of stimulus materials like sound recordings, photographs, real objects, models, diagrams, sound motion pictures and television. The problem in general is to abstract from all or most audio-visual teaching materials and methods those general characteristics to which may be applied abstracted and generalized concepts of learning. The question becomes this: What are the most useful guiding concepts, generalizations, statements and principles which can be selected from a great diversity of learning theory and applied appropriately to the range of instructional materials and methods in order to advance learning toward many different educational objectives?

**General Characteristics of Audio-Visual Materials**

Justification for the use of audio-visual materials should be based on their distinctive and perhaps unique characteristics and possible contributions to learning. Their advantages and disadvantages should be defined *functionally* and in relation to the advancement of learning. These should then be tested by experimentation. Among the assumed advantages and characteristics the following may be listed:

1. To increase and sustain attention and concentration
2. To provide concreteness, realism and "life-likeness" in stimulus situations calculated to instigate learning
3. To explicate and increase the meaningfulness of abstract concepts for the student
4. To bring remote events, remote in either space or time, into the classroom for students
5. To introduce opportunities for situational or "field" types of learning as contrasted with linear-order-verbal and written language communication
6. To facilitate or advance the processes of applying what is learned to realistic performance and life situations
7. To stimulate interest, increase motivation, introduce variety of stimulation and generally to increase the "personal involvement" of students in learning.

These and other characteristics should be delineated and proven.

The same should be done with the assumed disadvantages and limitations. Is it not true that any teaching method or stimulus material vis-à-vis other methods and materials have both advantages and disadvantages for specified purposes which need to be