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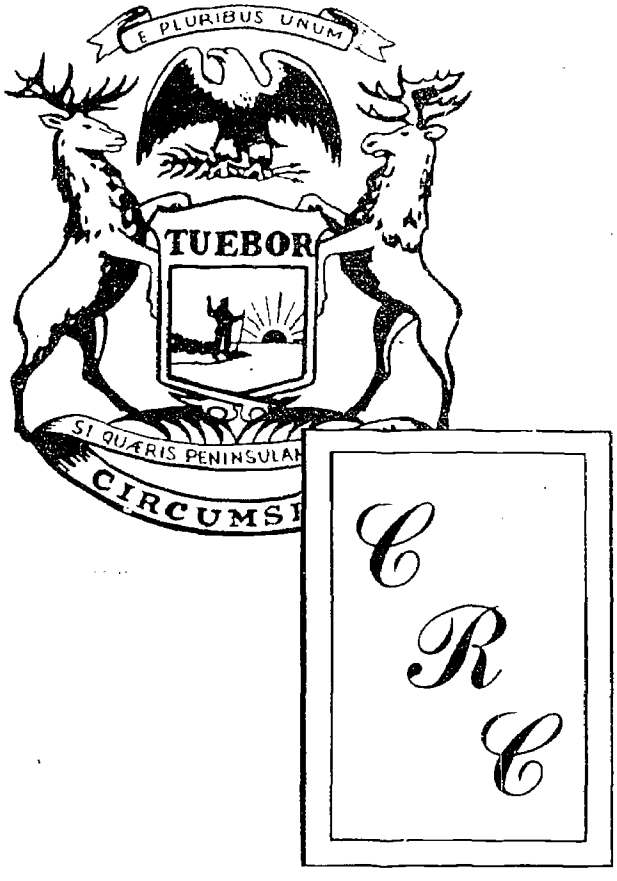
ABSTRACT

Proceedings from an institute held in Michigan, October, 1972, for curriculum resource consultants on media, methods, and materials for special educators are presented. Described in the section on planning are the institute's objectives, criteria for selection of participants, resource consultants' names and addresses, and a review of planning decisions. The instructional phase consists of descriptions of the institute's events, which include such presentations as a multi-media approach to learning, use of an 8 mm movie camera for making educational films, film making, transparencies for teaching, videotape production, teacher media competencies for student learning, media within a systems framework, and instructional materials centers' services to curriculum consultants. Evaluation and feedback are discussed in relation to participants' statements and suggestions for improvement on the institute in general, the instructional staff and their strategies, and on the followup session. Provided are details of the followup session, in which presentations treated media utilization in the education of the handicapped, and systematic organization of inservice training; and in which participants engaged in brainstorming and reviewing activities. Included in the appendix are such items as a list of handouts, an outline of the institute, instructions for making or using the materials presented, a list of photographic terminology, and sources of equipment, materials, and publications (addresses are given for publications). (MC)

MEDIA
METHODS
MATERIALS

FOR SPECIAL EDUCATORS



A Special Study Institute

June 19-23 and October 19, 1972

REPORT

SPECIAL STUDY INSTITUTE

MEDIA, METHODS, AND MATERIALS FOR SPECIAL EDUCATORS

Michigan Department of Education
Bureau of Educational Services
Special Education Service Area
Lansing, Michigan

In Cooperation With:

Midwest Regional Media Center for the Deaf,
University of Nebraska
Special Educational Instructional Materials Center,
Michigan State University
Ingham Intermediate School District

University Inn
East Lansing, Michigan
June 19-23
and
October 19, 1972

Editorial Board
Dr. George Propp, Editor
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Mrs. E. W. Walline

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PREFACE

This report covers the Special Study Institute for Curriculum Resource Consultants which was held at the University Inn in East Lansing, Michigan on June 19-23 and October 19, 1972. The Institute on Media, Methods, and Materials for Special Educators was funded by the Michigan Department of Education. It was carried out in cooperation with the Special Education Instructional Materials Center of Michigan State University, the Midwest Regional Media Center for the Deaf of the University of Nebraska, and the Ingham Intermediate School District.

One of the functions of this report is that it serves as a model to professional educators who may want to organize and conduct a similar in-service training program.

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Chapter I

PLANNING PHASE

I. Instructional Task

Curriculum Resource Consultants (supervisors) are in need of continuing, on-going, up-to-date inservice in order to truly meet the needs of their districts. This Institute provided the opportunities for learning and sharing of ideas which are almost impossible to attain in any other way.

Curriculum Resource Consultants in the State of Michigan possess a rather unique role for which there is little historical precedent. In carrying out their highly specialized role, the CRC's require not only knowledge but the highest level of skills in presenting information to teachers. During the Institute, it was accurately pointed out that inservice training is the most difficult kind of instruction, as the goal is always to make the greatest possible impact in the shortest amount of time. It is for this reason that the Institute had the dual role of disseminating knowledge and providing a training model.

II. Specifications of Objectives

The objective of the Institute were primarily to:

a. Reinforce learning

b. Develop skills and techniques for inservice at the local and/or intermediate school district level

c. Develop meaningful materials and the methods of their use with teachers in the field

d. Provide instruction and information on any new teaching aids, equipment, materials and techniques

e. Develop a meaningful document as a model for inservice training in instructional media

Specific objectives in the day-to-day activities will be delineated in the body of this report.

To plan and conduct the Institute, a highly qualified

staff was acquired. Personnel involved in the management of the Institute were as follows:

Dr. Robert E. Stepp, Institute Director, Director of the Midwest Regional Media Center for the Deaf, University of Nebraska

Jane Walline, Workshop Coordinator, Curriculum Resource Consultant, Michigan State Department of Education

Dr. George Propp, Instructor/Editor, Assistant Professor, Northwestern University

Sally Snyder, Assistant to the Director, Midwest Reional Media Center for the Deaf, University of Nebraska

Sue Ann Yovanovich, Coordinator of Field Services, USOE/MSU Regional IMC

S. Joseph Levine, Coordinator: Technology of Dissemination, USOE/MSU Regional IMC

III. Assessment of Entering Behaviors

Criteria for selection of the Institute participants was as follows:

1. Must be qualified to accept, or have accepted a position as a curriculum resource consultant.

2. Regional areas were a consideration in selection.

3. The number of participants could not exceed thirty.

The following is a list of the participants who were able to meet the criteria and who were able to attend.

A perusal of the following list of participants indicates a wide geographic dispersion. Acquaintance with the participants subsequently revealed a great deal of commonalities as far as general education background was concerned. Media competencies varied. Inability to evaluate entering competencies in a situation like this is detrimental to effective planning, but programming was sufficiently flexible to permit adjustments to new input as well as to individual needs. The list of participants follows:

SPECIAL STUDY INSTITUTE

"MEDIA FOR CURRICULUM RESOURCE CONSULTANTS"

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547-4278

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126 Pleasant
Charlotte, Michigan 48813
543-2127

IV. A Review of Planning Decisions

To see the Institute in full perspective, a summary of all planning activities is in order. A step-by-step development follows:

A. Announcement of purpose, participant qualifications, date, and place was made by SDE-DSE by mail sufficiently in advance of the Institute to attract qualified candidates.

B. Communication and application blanks sent to Directors of Special Education, to Intermediate School District Superintendents, and to selected local district Superintendents.

C. Returned applications were screened by SDE-DSE.

D. Preliminary invitations to attend were sent to eligible applicants.

E. Contacts with instructional staff was made and management roles were assigned.

F. Nineteen applicants were formally invited to attend.

G. General format of Institute was developed (see schedule). Topics to be covered were agreed upon, and instructional approaches and techniques were developed.

Emphasis during Institute was to be on laboratory

approach. In each lab, an introductory period was to be utilized, during which equipment, techniques, and educational applications were to be reviewed and discussed. These introductory periods should be in addition to the general session overviews.

Lab sessions were to involve no more than five participants, so that practice opportunity would be maximal.

H. Equipment needs were analyzed and various sources explored.

I. Time and space allocations were made.

J. Supplies for participant use were budgeted for the Institute. Supportive supplies for VTR sessions were provided by RIMC/MSU. The IRMCD would be reimbursed for supplies used.

K. It was agreed that all materials produced by the participants became their own property which, hopefully, they could use in training programs of their own.

L. A tentative schedule was developed.

Chapter II

INSTRUCTIONAL PHASE

I. Content

This chapter consists mainly of a description of the instructional events and the manner in which they were scheduled.

The Institute started with an orientation or "get acquainted" session on Sunday evening, June 18. At that time, the participants and the staff members were introduced and the goals were discussed. Some minor changes in scheduling were made at this time.

The schedule and a summary of the day-to-day learning activities follows:

General Session #1--Dr. Robert E. Stepp

"Introductory Presentation"

This was a multi-media presentation the content of which can be summarized as follows:

1. Advocate multi-media approach
2. Discuss application of educational media
   a. Motivate students for learning
   b. Permit the storage and retrieval of information
   c. Select from a wide variety of learning resources
   d. Instruct the deaf student in how to learn
   e. Provide for simulated learning experiences
   f. Allow for different freedoms of expression
   g. Offer new avenues for creativity
   h. Utilize as a form of evaluation
   i. Assist the deaf student in being an independent learner
3. What must the learner do in order to learn?
   a. Use proper materials for learning tasks:
      (1) verbal ideas
      (2) visual ideas
      (3) manipulative ideas
      (4) simulated ideas
   b. Select location for learning task:
      (1) classroom
      (2) library
      (3) school building

MEDIA WORKSHOP FOR THE
CURRICULUM RESOURCE CONSULTANTS
June 19 - 23, 1972

	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY
9:00 am	Registration	(5) Transparencies --Dr. Propp	(7) Videotapes --Levine --Yovanovich	(9) Preparation of a Mediated Unit --Dr. Stepp	(10) Application of Educational Media to Concept Development. ---Dr. Propp
9:30 am	(1) Introductory Unit ---Dr. Stepp				
9:45 am	- - - - - - - - coffee break- - - - - - - -	-coffee break- - - - - -	-coffee break- - - - - -		- - - - - - - - - - -
10:00 am	(2) The Teacher as a Learning Mentor ---Dr. Propp	Labs--- A. Slides B. 8MM Films C. Videotapes D. Transparencies	Labs--- A. Videotapes B. Transparencies C. Slides D. 8MM Films	Open Labs	(11) SEIMC Services --S. Yovanovich
11:00 am					
11:30 am			Group Luncheon --Dr. Alonzo		
12:00 N	Lunch			Lunch	
1:15 pm	(3) 8MM Films --Sally Snyder	(6) 2 X 2 Slides ---S. Snyder	(8) Media Competencies of CRCS--Dr. Stepp	Visit to SEIMC at MSU	(12) Summary Presentation --Dr. Stepp
2:00 pm	(4) Planning Boards ---Dr. Propp	Labs--- A. 8MM Films B. Videotapes C. Transparencies D. Slides	Labs--- A.Transparencies B. Slides C. 8MM Films D. Videotapes		Evaluation
3:00 pm	Planning Lab				
				---------- Social Hour Dinner	Adjourn

* Get acquainted Session on Sunday Evening

(4) community

(5) home

c. Identify social relationship for learning task:

(1) individual

(2) small group

(3) committee

(4) large group

d. Specify involvement of learner

(1) receiving

(a) visual stimulus

(b) audio stimulus

(c) tactile stimulus

(2) observing

(a) witnessing

(b) watching

(3) participating (practicing)

(4) performing (doing)

4. The teacher must become the "facilitator" of learning for each child in his academic custody.

a. Teacher key person to all instruction

b. Teacher opens avenues to selected complimentary media for individual student use.

c. Teacher encourages student production of media

5. Instructional Strategy

a. Group instruction or tutorial instruction

b. Independent study or dialogue programs

c. Individualized learning or socialized learning

6. Learner benefits through match of:

   Man (student)

   Media (materials)

   Machine (devices)

   Mode (method)

7. The secret weapon in the education of the deaf is the deaf student himself. We have not developed the instructional strategies to challenge his entire potential. We must help the deaf child become an independent learner. The deaf student is delayed in his educational program only because we (as educators) have not found the means to tap his intellectual resources. He should be allowed to succeed or fail on the basis of his mental capacity and not because of his hearing deficiency.

General Session #2--Dr. George Propp

"The Teacher as a Learning Mentor"

This was a narrated slide presentation which stressed the following points:

In attempting to view the new concept of a teacher, how will her role change?

What will the 70's bring to education? We must prepare for change. The most significant change will be from a teacher dominated situation to one of student involvement or student direction.

The teacher will become the learning mentor, working as a director or guide in the learning process. She will not be a time keeper, a disciplinarian, and will have no time for tests, report cards, etc.

When you see the diagnostic profiles of your students, do NOT go back to the classroom and do the same old thing if achievement is not what it should be.

The learning mentor: (according to Charles Silberman)

1. Develops a positive attitude for learning

2. Develops communication skills

3. Develops an intellectual base

4. Develops subject matter and additional social skills

Many things we have been doing in the past must be re-evaluated.

The deaf child must have a learning mentor at every level. First, we must free the teacher who sometimes loves her chains. We must change from a situation where children sit passively and the teacher has the learning experience to one where the children are learning. We must involve the learner. Technology enables us to do this.

Changes needed: curricula, staffing, architecture, scheduling, etc.

A. What will the teacher do to establish a positive attitude toward learning and a personal sense of worth?

1. She relates with the children in general and has a knowledge of children and deafness.

2. Her knowledge of psychology and the behavioral sciences helps her understand herself and the deaf community. The deaf child must be able to receive help from her in becoming a successful deaf person, not as an imitation of a hearing person.

3. She must be able to appraise and evaluate progress.

B. The teacher must be an expert on communication.

1. Teachers talk too much.

2. No choosing sides on methodology of communication.

3. Must be able to teach communication skills to her children, above and beyond language and manual methods; including all communication skills such as drama, crafts, arts, etc.

4. Mentor must be able to utilize media effectively as a communication skill.

5. Communication must be two way.

C. The teacher will develop an intellectual base.

1. The children must learn <u>how</u> to learn. They will need to find solutions to problems that don't exist today, and the teacher must prepare him.

2. There must be a good balance between what the child wants to know and what he needs to know. He is more strongly motivated when he is actively involved.

3. He should learn HOW TO LEARN.

4. The mentor as a student of teaching, is also a model.

D. Subject matter skills

1. Usually determined by school curricula and study guides.

2. The idea is to advance a student upon a continuum of learning.

3. Teacher must be a diagnostician in order to avoid gaps and overlapping.

4. Major skill of mentor is in organizing.

5. Effectiveness is not the sole criteria: Subject content must also be acquired efficiently and must be presented in ways that are interesting to the student.

6. Knowledge of resources and ability to produce instructional materials are key competencies of the mentor.

General Session #3--Sally Snyder

"8MM Films"

This presentation covered the key points of using an 8MM movie camera for making educational films. This was demonstrated and the handout sheets coordinated with the demonstration are in the appendix of this report.

The highlight of this presentation was the showing of a series of 8MM movies as examples of the variety of instructional roles that film can play in the classroom. Film titles and their purpose are listed on the next page:

1. "Play Dough" -- Instruction and Motivation

2. "The Rescue" -- Language lesson done by students at the Wyoming School for the Deaf. Mask used for captioning.

3. "Carousel Instruction"--A "How-To" film. Captions used as needed.

4. "Rhythm" -- Series of films synchronized with a tape recorder showing movements of animals coordinated with music. Used for sound discrimination training.

5. "Baseball Catcher" -- A problem solving film. Inquiry.

6. "Amusement Park" -- Discussion stimulation.

7. "Feet" -- A film to stimulate classroom activities, promote verbalization.

8. "Shapes" -- Film to teach shapes to preschool children.

9. "Origami" -- Illustrated importance of subjective vs objective point of view. A "How-To" film.

10. "Footsteps" -- Animation film

11. "Stop Light" -- (rear screen) Student Involvement. Training function.

12. "A-B-C-D" -- (rear screen) Tactile drill. Use with transparency flim.

13. "Motorcycle" -- Simulation. Recreate an activity.

14. "Clouds" -- Kids lay on floor. Aesthetic touch.

Another good suggestion was to project large pictures on the wall so child can "enter" the picture.

General Session #4--George Propp

"Planning Boards"

This presentation began with the differentiation between the educational film and the typical "home movie." The sequence of instructional events was as follows:

1. Discussion of why "home movies" have a bad name for everyone except the participants. Conclusion: they are generally unplanned.

2. Showed the opening segments of an excellent educational film, "Rainshower." At a prescribed point, the film was stopped and the participants were asked to list some of the shots they would incorporate into the completion of the film.

3. Then, the film was shown to completion and the participants tabulated their score.

4. In discussion of the results, film planning vocabulary was introduced.

5. Using the planning board forms (See Appendix), the instructor described how a visual presentation is planned.

6. The instructor also explained more detailed and complicated planning board processes.

7. It was emphasized again and again that the procedure for planning visual presentations, whether slides, films, videotapes, etc., was basically the same.

8. The goal of this instruction was to enable the participants to plan a simple visual presentation in the lab that followed this general presentation.

The approach in this presentation was basically one of discovery. The participants learned that they could plan films. At the same time, they spontaneously acquired the requisite vocabulary which was further reinforced in the lab session and other presentations.

The media used in this presentation was a 16MM film, "Rainshower." The instructor also used some overhead transparencies, and some slides on the more complex forms of

planning boards. Participation was encouraged with both written and vocal responses.

Lab Session: Planning Boards---Robert E. Stepp, George Propp, Sally Snyder

In small groups, the participants were asked to do planning boards for a slide unit of 10 to 20 slides. As they went along, they were assisted by the presence of the instructors.

The planning boards developed in these lab sessions then became the basis of a slide program which the participants actually made in the slide labs on the following days.

General Session #5--George Propp

"Transparencies for Teaching"

For this presentation Dr. Propp used a set of more than 100 transparencies. The transparencies, except for a few, were all made by Dr. Propp. This was done to emphasize the potential of teacher-produced visuals. The transparencies were made by several different processes with equipment that is generally available in most school districts. The major points of the presentation may be summarized as follows:

A. There is a widespread use of the overhead projector in special education, though full potential is seldom attained.

B. Visuals for use on the overhead prijector are generally available in all subject areas for all grade levels.

C. Teacher produced materials are important as they are generally used for coordinating machine, teacher, materials, pupils, curriculum, and instructional techniques.

D. Unique features of overhead utilization are:

1. It directs attention where you want it and reduces distraction and conflicting stimuli.

2. It permits or facilitates various modes of communication: speech, pictorial, writing, fingerspelling, motion, symbols, etc..

3. It can clarify difficult concepts that can't be effectively communicated otherwise.

4. It can stimulate verbalization.

E. Precautions to take:

1. Not all materials are worth the price.

2. Maintain student participation and two-way dialogue.

F. Production of transparencies:

1. Processes:

a. Hand made

b. Heat process

c. Color lift

d. Diazo

e. Photocopy

2. Graphics---freehand drawing, tracing, copying, enlarging.

3. Lettering--processes and standards.

4. Adding color: audiovisual pens and pencils, adhesive film, special color processes.

5. Enhancing utilization:

a. Using movable objects on transparencies or on the overhead stage.

b. Special mounting frames.

c. Progressive disclosure: masks, flaps, and overlays.

Production Labs--four sessions, Tuesday and Wednesday

To reinforce learning and to provide practical experience in use of various equipment, the participants were broken up into four small groups, each with a workshop instructor(s). Each group was rotated through four lab experiences as follows: slides (Dr. Stepp), Transparencies (Dr. Propp), videotaping (Mr. Levine and Ms. Yovanovich), 8MM films (Ms. Snyder). The activities of each lab session can be summarized as follows:

Slides

The emphasis here was on using the 35MM camera and the Kodak Visual Maker. Activities consisted of:

1. Review of camera operation
2. Review of lighting factors, camera angles, and general photographic skills
3. Applications of Kodak Visual Maker, including sources of pictures.
4. Suggestions on the use of own cameras
5. Making a slide program from the planning board developed on the previous day

Because of the limitations of time, a considerable amount of information required for this section was provided in the form of hand-outs, some of which are included in the appendix of this report.

Transparencies

This lab consisted of hands on experiences in producing transparencies. Employing various production techniques, the participants produced transparencies which they can perhaps use in their own inservice training efforts. The lab instructor provided guidance on:

1. Sources of transparency masters and transparency making materials.

2. Making heat process transparencies using black image film, color image film, and reversal film.

3. Use of adhesive film to add color.

4. Hand-made transparencies on reprocessed x-ray film with colored pens and pencils.

5. Making color lift transparencies with the GBC Laminator.

6. Mounting overlays.

7. Mastering the general techniques for making masks and flaps.

8. Lettering--felt tip pen, wrico, rub-on, paste-up, and mechanical.

Videotaping

In this lab session, both planning and technical skills were reinforced and developed by the expedient of having each group develop a short videotape program in the form of a commercial. This put a premium on creativity and teamwork. Some interesting and unusual programs were developed and all participants had the opportunity of being involved in both design and equipment operation. The experience in most cases involved the need to create original art work and captions.

8MM Films

In this lab session, camera operation was reviewed. Each group participant took an 8MM camera outdoors and mastered the various shooting techniques and otherwise became familiar with the camera's capabilities and limitations. While some participants were doing this, others became familiar with the basic techniques of animation. Using prepared materials, the Institute participants, in turn, "shot" a short animated sequence.

General Session #6--Sally Snyder

"2 X 2 Slides"

In this session on Tuesday afternoon, Ms. Snyder showed various applications of slides to visual instruction. Step-by-step, her presentation covered the following points:

A. Using two screens, the instructor showed and discussed the various types of cameras used and the resulting product. She showed slides made by a Minolta 35MM camera, a Kodak Instamatic, and a Kodak Visual Maker.

B. A major focus of the presentation was on teaching the child to use a camera: to permit the child to express himself through pictures. To make her point, the instructor showed a series of slides that a four-year-old child made of his visit to a fire station.

C. We should attempt to take the whole spectrum of a

subject. We should try to avoid isolating things. to emphasize this, the participants were shown a sequence of a garden as it comes and goes---ten slides covering a whole year's garden growth. It teaches not only about garden's, but about seasons. It collapses time. It makes concepts more concrete.

D. As an example of using the camera to enlarge materials for classroom observation, Ms. Snyder showed a slide of a skeleton copied from a book. The same can be done with maps, charts, and other detailed illustrations.

E. Using slides for storytelling. To emphasize this point, the participants were shown the contents of an illustrated book which were transferred to slides to facilitate classroom discussion. This slide series was of a story called "A Boy, a Dog, and a Frog."

F. The art teacher, as another example, can use slides for the detailed study and analysis of a work of art.

G. If an art display comes to town, take 35MM pictures and use them in class long after the display is gone. As an example, the participants were shown a Peter Max display and some circus scenes.

H. If students are doing an unusual classroom project, use the camera to record this for posterity. this includes children's art.

I. If you see a good picture story in a magazine, why not copy it. Thirty kids can look at the pictures at the same time; whereas you can't have thirty kids look at LIFE magazine at the same time.

J. Slides can be used to promote classroom discussion. As an example, you can sometimes take a part of a picture and have children recreate the missing parts.

K. If a teacher makes good bulletin boards or posters, why not take a picture of them.

L, Similarly, if a teacher has an ideal room environment or arrangement, document it with pictures. Show parents what is happening in school.

M. If a teacher wants to teach children the proper way to cross the street, she can simulate a situation by using slides. For this, use rear screen projectors, put chalk marks on the floor, and simply create a street crossing in the classroom.

N. Ms. Snyder showed several short slide series (usually about three) to emphasize the importance of establishing a frame of reference. Don't show a picture of a cabbage or of a spark plug without showing where it came from. Close-up viewing is fine, but things must be seen in proper perspective.

O. The instructor then showed a series of slides that were taken of a moon landing from a TV screen. A good 35MM camera is needed for this purpose.

P. Make a slide documentary of guest speakers or important visitors to your classroom.

Q. If you want to teach your children to read signs, photograph them and bring them to the classroom.

R. Use slides to provide children with a tactile experience. Shown were some slides of the letters of the alphabet which a child traces with her finger on a rear-view screen.

S. Bring remote places to the classroom. If you visit Washington D.C., take along your camera.

T. Develop slides to teach concepts. Ms. Snyder showed some slides to teach the concept of RED. You can do the same with types of wood for a woodworking class; kinds of pleats for homemaking, and so forth.

U. In English classes, use slides to motivate original language. Verbalize a visual concept.

V. Use slides for independent study situations, much in the same way as you use study prints. These would by shown on small rear-view screens.

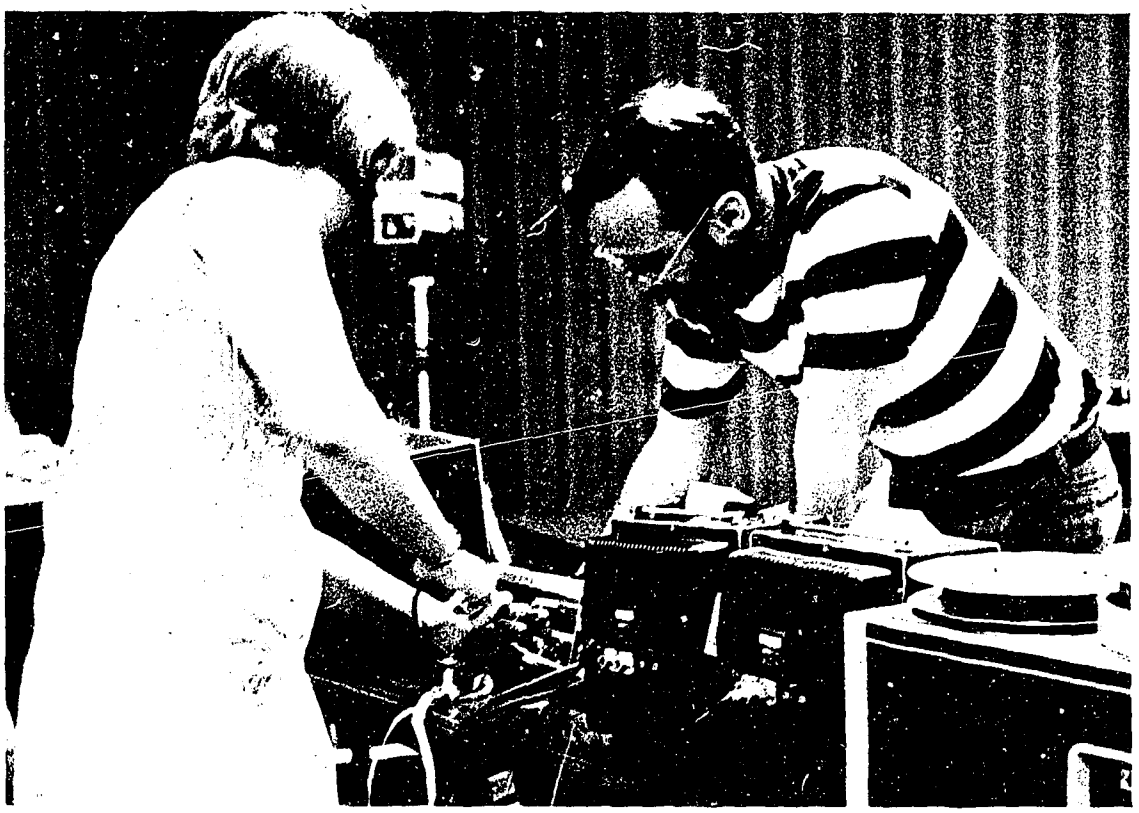
Last, Ms. Snyder showed some slides of a TV set that had been adapted to use with a Carousel slide projector. The TV apparatus was removed and mirrors positioned so that slide pictures appeared on the TV screen. It was used with small children who got a tremendous thrill out of seeing their own pictures on TV. This device illustrated the fact that slide utilization is limited only by one's imagination.

General Session #7--Joe Levine and Sue Yovanovich

"Videotaping"

It was attempted to determine, with audience participation, the order of importance of different forms of videotape utilization. The categories of utilization were:

1. Close-up demonstration
2. Teacher self-evaluation
3. Student/Children self-evaluation
4. Development of language skills--plays, etc.
5. Parent-Teacher conference



Another utilization breakdown that was discussed is summarized as follows:

Introspective Feedback	Delivery of Information	Collection and Storage of Data
Evaluating self-teaching	Demonstration	Presentation
Evaluating student performance	Instruction	Record of action
Encourage creativity	Teaching skills	Remote diagnosis
Reflection of self	Observation	Progress reports
	Motivation	
	Reinforcement	
	Stimulus	
	Current events	

The technical aspects of using videotapes was discussed and demonstrated. This covered:

1. Connections for different set-ups
2. Threading
3. Different tape formats
4. Adjustment of audio
5. Adjustment of video
6. Camera focus

On Wednesday, a group luncheon was held in the Banquet Room of the Starboard Tack. Guest speaker at the luncheon was Dr. Lou Alonzo, Director of the USOE/RIMC/MSU. Dr. Alonzo discussed the role of the IMC network in the education of the handicapped and touched upon the development of a mutually beneficial relationship between the RIMC and CRC personnel.

General Session #8--Robert E. Stepp

"Teacher Media Competencies for Student Learning"

In this presentation, Dr. Stepp, from the viewpoint of a Curriculum Resource Consultant, discussed the various media competencies that a CRC would want to develop in a classroom teacher of the handicapped. The presentation involved considerable audience participation and could be summarized as follows:

A. Broad competencies of an effective media teacher:

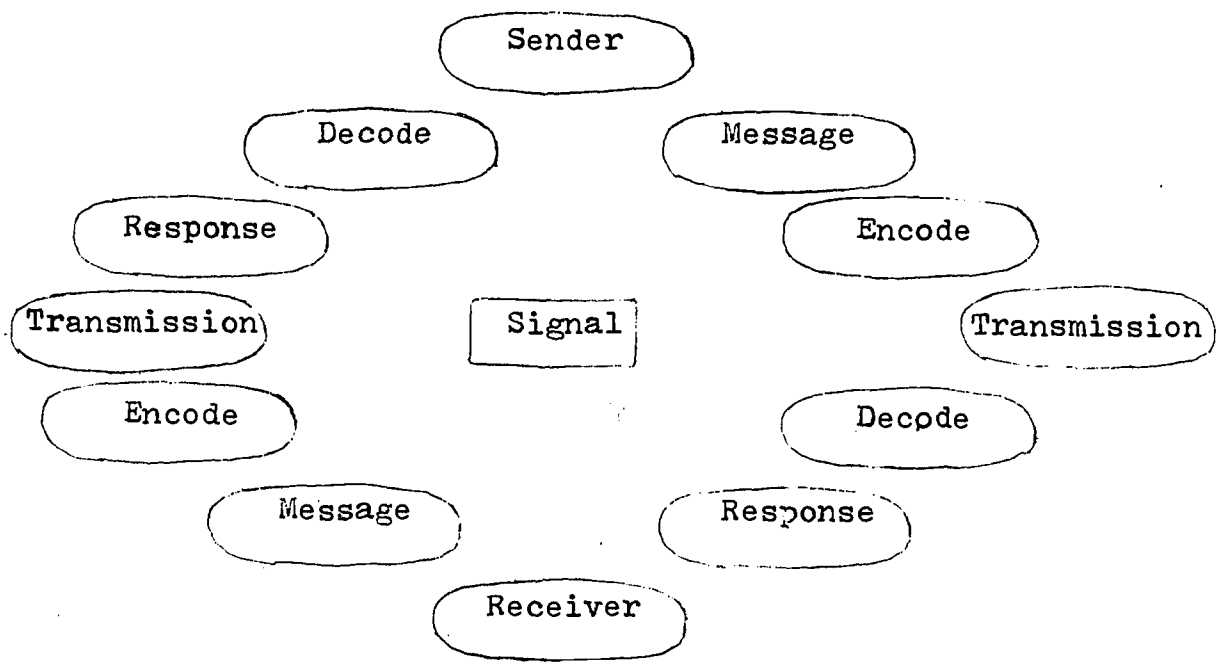
1. Use appropriate media
2. Planning media messages
3. Selecting appropriate media resources
4. Creating essential media
5. Prescribing media study for specific learning task
6. Guiding sensory media interpretation
7. Consulting (with learner) for media communication

B. Developmental stages of Mediated Instruction:

1. Media orientation
2. Media observation
3. Media selection
4. Media utilization
5. Media preparation
6. Media design
7. Media prescription
8. Media application
9. Media integration

C. Specific media competencies for teachers of handicapped children:

1. Operate videotape recorder
2. Produce original transparencies
3. Produce 2 X 2 slides
4. Produce 8MM movie films
5. Develop effective bulletin boards
6. Understand communication theory and its applications to learning. A model suggested by Dr. Stepp is as follows:



7. Use multi-media
8. Coordinate media
9. Select or secure materials
10. Match media and instructional content
11. Teaching students to use media
12. Mastering techniques of prescriptive teaching

13. Recognizing alternative methods of media

14. Developing ability to search and evaluate

15. Minor repairs and maintenance of hardware

General Session #9--Robert E. Stepp

"Preparation of a Mediated Unit"

One should realize that at the present time a very small percentage of school instruction is packaged in mediated units. To a great extent, the teacher within media will work with a combination of purchased and self-made materials. To start off, Dr. Stepp reviewed the production skills needed by the teacher who is mediating her instruction. These skills were broken down into three categories as follows:

1. Graphic Techniques

   a. drawing--freehand, tracing, copying, etc.

   b. lettering--stencils, hand, stick-on, mechanical

   c. making transparency masters

   d. bulletin boards and visual display

2. Photographic Techniques

   a. still pictures--slides, polaroid, prints

   b. motion pictures--8MM

3. Recording Techniques

   a. audio--casette, reel-to-reel

   b. videotape--casette, reel-to-reel

A more sophisticated level of skills is attained when the teacher is able to combine and synchronize pictures and recordings or by making motion pictures with magnetic or optical sound tracks.

Dr. Stepp then showed an outstanding example of a coordinated media unit on the subject of the Wankel engine. The

objective of the unit was to teach the principle upon which the rotary engine works. The unit used transparencies, slides, 8MM film, handouts, and manipulative materials. It is something that must be seen to be fully comprehended. Participants were all able to achieve unit objectives, and are all presumably prospective customers for rotary engine cars.

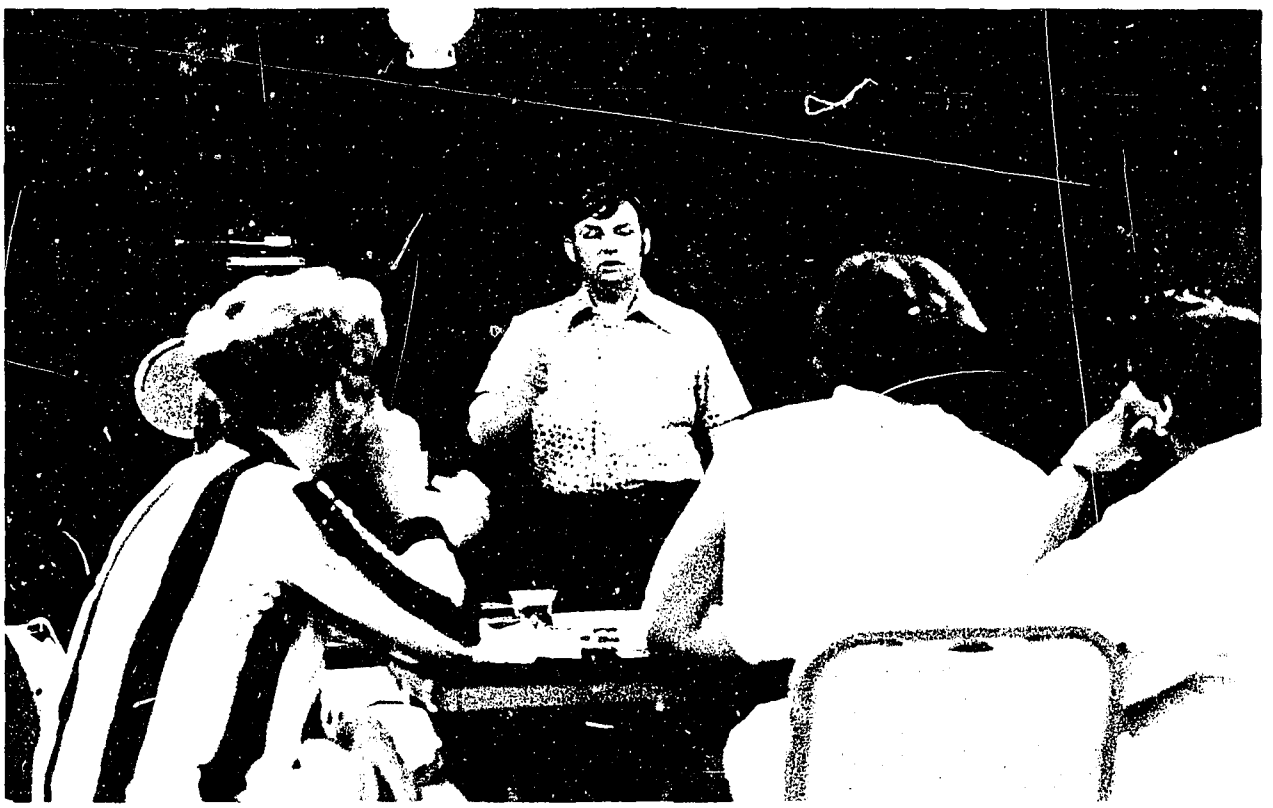
On Thursday afternoon, the group went to Michigan State University for a tour of the Regional Instructional Materials Center for Handicapped Children and Youth. The participants were impressed with the variety of materials available from the Center. They were shown some of the resource design efforts of the Center, as well as the distribution of materials and dissemination of information.

General Session #10--George Propp

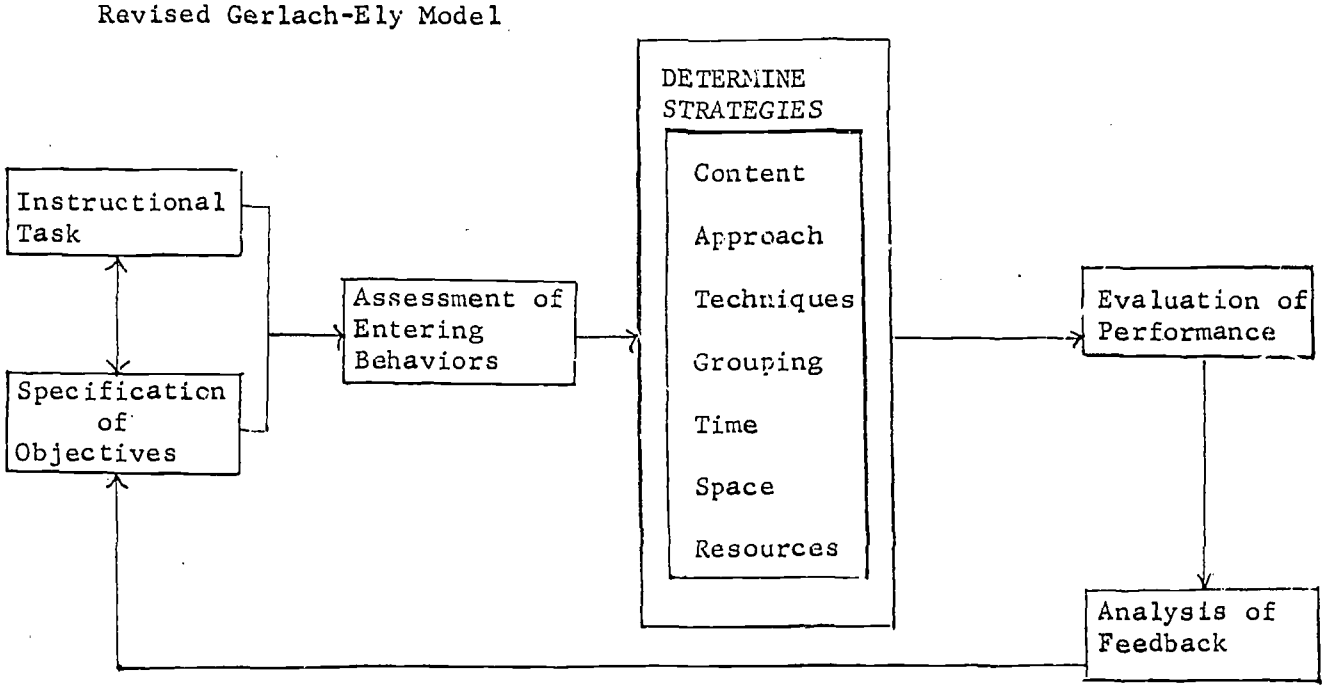
"Application of Educational Media to Concept Development"

Dr. Propp stressed that most effective instructional design takes place within some sort of systems framework. He emphasized that there are many models of instructional planning. These models range from the simple to the very complex. In spite of the sometimes exotic terminology, they all possess the basic characteristics of what good teachers have always been doing.

Whether dealing with a simple concept or with a more sophisticated learning increment, the basic approach is generally similar, as a good instructional model will be flexible enough to lend itself to all levels of planning. Dr. Propp showed a slide program developed for the purpose of improving instruction through systems design. The slide program was based upon a revision of the Gerlach-Ely model as illustrated on the following page. In narrating the program, Dr. Propp placed most emphasis on the development of strategies, particularly the search for and development of resources.



Revised Gerlach-Ely Model



I. Instructional Task (problem):

II. Objectives:

A. General:

B. Specific (behavioral terms):

III. Describe target population and entering behaviors:

IV. Strategies:

A. Content:

B. Approach:

Expository ——— Discussion ——— Inquiry

C. Techniques:

_1. Lecture
_2. Discussion
_3. Inquiry
_4. Panels
_5. Direct Experience
_6. Demonstrations
_7. Field Trips
_8. Sole Playing
_9. Simulation, gaming
_10. Audiovisual
_11. Other

D. Grouping:

_1. Large group
_2. Small group
_3. Independent study

E. Time and space allocation prescribed:

F. Resources:

Available | Original Production

V. Evaluation of Performance:

VI. Analysis of Feedback:

General Session #11--Sue Yovanovich

"SEIMC Services to Curriculum Consultants"

Sue Yovanovich described the various functions of the USOE/RIMC/MSU and the services provided handicapped children and youth. The emphasis was on how the RIMC could provide supportive services to CRC personnel. Ms. Yovanovich provided a large number of handouts, all but a few of which were too bulky to include in this report. A resume of RIMC services and functions follows:

The USOE/MSU Regional Instructional Materials Center for Handicapped Children and Youth (USOE/MSU RIMC/HCY) was funded in June of 1966 as a regional segment of a newly established federal network designed to demonstrate the practicality of improving the education of handicapped children through inservice education of their teachers in the effective use of instructional materials and behavior/teaching strategies. The objectives were, and continue to be (1) information system development, (2) information dissemination, (3) instructional resources development and (4) delivery system development.

The Regional IMC supports inservice education program development in Indiana, Michigan, and Ohio. Early cooperation was secured from the three state directors of special education of the region to assist in developing a regional plan to include three related intrastate networks of state-sponsored instructional materials services for teachers of handicapped children.

Summary of Services:

Cooperates with Special Education Division, state departments of education in Indiana, Michigan, and Ohio in establishing local SEIMC networks.

Assists state departments of education and associate SEIMC personnel in planning, conducting, and evaluating inservice activities.

Maintains central repository of materials for examination and loan by teachers.

Provides question/answer information retrieval service to teachers, administrators, and others working with handicapped children.

Disseminates information to state departments of education and their designated associate SEIMC personnel.

Develops training kits to be used by inservice educators in conducting local workshops for teachers.

Conducts inservice training sessions for associate SEIMC personnel (as designated by their respective states).

General Session #12--Robert E. Stepp

"Summary Presentation"

1. Discuss changing concept from Multi-Media Approach to Coordinated Media Approach

   a. Multi-Media concept means a wide variety of materials.

   b. Coordinated Media implies carefully selected materials planned and designed to teach specific content.

2. Selection of printed materials

   a. Style of narrative

   b. Vocabulary and reading level

   c. Concern for comprehension

   d. Involvement of reader

   e. Most printed materials are written from the point of view that the learner is reading about the situation, not as if he is following the development of the event or problem. If the learner is to have any emotional reaction or is to feel any sense of involvement, how does this change the format and style of preparing materials?

3. Selection of projected materials

   a. Viewpoint

   b. Visual image

c. Legibility

d. Involvement of viewer

e. Most projected materials are produced with the learner serving only as a viewer. He is not expected to be active or overtly responsive. If the materials are to evoke a response from the student, how does this change the content of the visual, the perspective of the scene, the design or shape of the item, and the wording of the title or caption?

4. Relationship of media and teachers

a. Teacher without media (no media at all)

b. Teacher with media (utilization of media by the teacher)

c. Teacher within media (motion pictures, television, programmed text, slide series--a situation where media does the teaching)

5. Relationship of media and students

a. Student without media (no media at all)

b. Student with media (use of media by students in their presentations and responses)

c. Student within media (student expressed himself via media)

6. Instructional communication

a. Purpose of media

b. Necessity for media

c. Desired use
"As media specialists, we must stress the idea that the purpose of instructional resources is to assist the learner--not the teacher."

7. Conclusion:

To employ media skillfully, teachers of the deaf must be competent in message design. They must be able to recognize the appropriate channel or mode for the learner to

receive ideas and to have a high level of understanding, comprehension, and retention of these ideas. Teachers must be cognizant of the difference between the appropriate reception mode of the learner and a selected communication mode for the teacher. Message design also implies creation and production of instructional materials in a form that can be easily decoded by the learner. Message design suggests the need for an order and structure to the lesson. Implicit in these thoughts is the belief that both teachers and students develop messages and create response media. Students should be encouraged to use and produce all types of instructional materials as part of their expressive language. Incidental, but essential to message design, is the need to know how to produce materials, operate equipment, select resources and evaluate all forms of media.

For Further Study Read:
Chapter 16. Utilization of Educational Media in the Education of the Acoustically Handicapped Student, Robert E. Stepp, The Hard of Hearing Child, Frederick S. Berg and Samuel G. Fletcher, Grune and Stratton, Inc., 1970.

II. Other Strategies

A. Approaches:

Various components of the instructional phase featured different approaches, although the general tendency was toward discussion and participation. Some of the learning segments were strictly expository with strong emphasis on visual communication and other segments were on the inquiry/discovery extreme of learning. The emhasis was on a variety of approaches.

B. Techniques:

Similarly, the Institute featured almost every conceivable instructional technique. Even within units there was frequently a combination of techniques. During the Institute, the participants were exposed to lectures, discussion, inquiry, panels, direct experience, demonstrations, field trips, role playing, simulation and gaming, audiovisual, and other instructional techniques. In most of the large group presentations, there was a combination of techniques with visual communication as the major communication mode.

C. Grouping:

A major part of the instructional input was presented in large group sessions. Reinforcement and direct experiences were, for the most part, conducted with small groups and with individuals. The emphasis was on matching instructional content with the most effective grouping.

D. Time and space allocation:

There was some concern over whether a week would be adequate to cover all the media competencies desired for CRC personnel. However, conditions were such that a two or three week institute was out of the question. It was largely due to this factor that a follow-up session was written into the plan. The follow-up session provided the opportunity to perform reinforce-

ment activities on the participants' own time and in their own local setting. A longer Institute might have been desirable, but the six-day constraint did not seriously limit the attainment of goals and objectives.

The Starboard Tack rooms of the University Inn provided an ideal setting for a media workshop. Seating and workspace was plentiful and comfortable. Lighting control, with dimmer switches and other options, was near perfect.

The only constraint of any importance was the fact that all the equipment had to be brought in. This problem was considerably minimized by the fact that all the needed equipment was available from the RIMC at nearby Michigan State University.

Workshop participants were guests of the University Inn. This provided a high level of social interaction, a major asset under the circumstances because almost all participants were in a relatively new role as CRC's in special education.

E. Resources:

The hardware used during the Institute was supplied by RIMC/MSU, the MRMCD, and MSU. Software was, of course, developed over a period of years by the instructional staff. The Midwest Regional Media Center for the Deaf has since 1966 conducted extensive media training for teachers of the deaf and has as a consequence a considerable library of media and other instructional resources. The hardware required for the East Lansing Institute is listed below:

16MM Motion Picture Projector
8MM Super 8 reel-to-reel Motion Picture Projector
8MM Super 8 loop Cartridge Motion Picture Projector (810 Model Number)
Videotape Recorder and Monitors
Porta-pack Videotape Recorder with Power Pack
Overhead Projectors
Hook 'n Loop Board (4' x 6')
Carousel 35MM Slide Projector (with remote control)
Kodak Visualmaker (for taking slides)
35MM Cameras with Tripods
Thermofax Copier
GBC Laminator (for color lifts)

Rear Screen Projection System
8MM Cameras (possibly three Kodak Instamatics or
something easy to use)
Tripod for each 8MM Camera
Cassette Tape Recorder
Instamatic Cameras (126 cartridge film)

Chapter III

EVALUATION AND FEEDBACK

The major objectives of the Institute were long-term goals. The ideal criterion of performance would be that each participant successfully organize and conduct a similar inservice workshop to improve the media competencies of teachers in the various districts represented by the CRC personnel attending this Special Institute. Evaluation on these terms are, of course, not possible within the framework of this report.

Evaluation was an integral part of the instruction provided by the Institute staff. Most units of instruction had specific behavioral objectives that were readily observable. The participants actually produced transparencies, slides, 8MM films, and videotape programs.

The evaluation techniques described in this chapter deal with two major intents and outcomes. The first deals with the motivation and stimulation that the participants received, and the second deals with the extent to which Institute knowledge and skills were applied to participants' role as Curriculum Resource Consultants. To measure the effect of the workshop on participant attitudes, a self-evaluation formula was used. To estimate the transfer of learning to CRC tasks, a follow-up workshop was scheduled for October. The evaluation data from both of these techniques are summarized below:

I. Self-Evaluation

A. General reaction to the Institute

"I found the workshop very helpful. I thought that the labs were especially helpful in the fact that we were allowed to handle the equipment and to experiment. Even though I felt very unsure of myself in many media areas, I didn't feel uncomfortable at any time with this group. It has encouraged me to get out of the daily rut and also to instill and encourage others to try new avenues of media."

"Some of the media skills presented in this session have proven to be outstandingly useful. How-

ever, I have had trouble in implimenting, these ideas with teachers as these ideas tend to threaten them! The post sessions has given me some idea of how to beat the 'threatening' part of it.

"I hope more of these sessions can be held so more ideas can be spread. I've found all of us in the teaching profession to be in a terrible rut when it comes to media."

"You have kept us so motivated, we will never finish with projects we want to carryout."

"I will be able to use the information from the workshop for inservice workshops in my own area."

"I really liked the 'kids' projects. Maybe we should have had more available for individual viewing (aside from the group presentation)."

"Upon return to the schools in September, I immediately tried to convey some of my enthusiasm for the use of slides and 8MM film to teachers of the handicapped. Many of these teachers are so ready to experiment in the use of media and only need a little push and reassurance. Because teachers and pupils enter into the media experience together, they both have a sense of the real and genuine satisfaction. I've found that just a little success with media can be a real booster for more use."

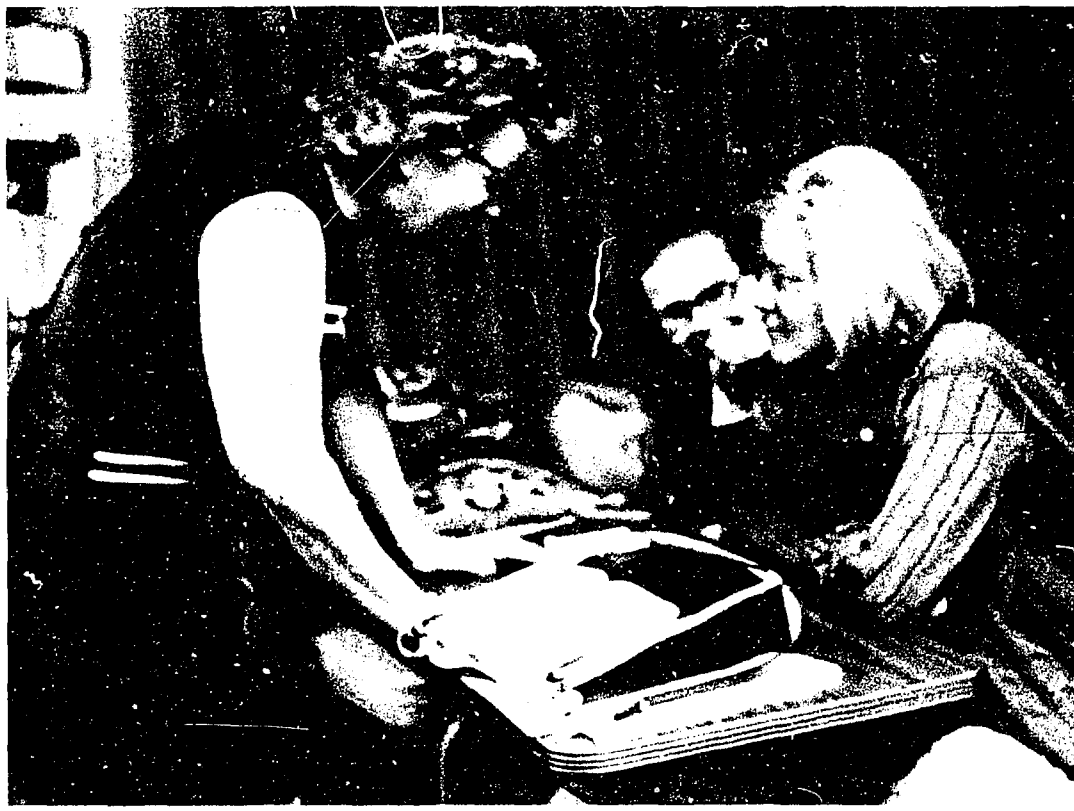
"The model of presenting ideas and materials with a follow-up meeting 'forced' me into using the skills a little more."

"I like the emphasis on coordinating several forms of media in teaching particular concepts."

"Although I had used commercially made materials, I was not familiar with production techniques. The idea of developing mediated units using various types of media was new to me, and this should be a useful tool in the future."

"I enjoyed every minute of the experience and appreciate having the opportunity to take part."

"I have used 35MM slides for fun. Now, I shall put my camera to work."



"At first I was worried about not having someone give me ideas, but the participation activities showed me what could be done."

"I was able to work with cameras and video recorders much easier as a result of the workshop."

B. The Instructional Staff and Instructional Strategies

"The staff from the University of Nebraska was friendly, competent, and seemingly unaware of our inability sometimes."

"Activities moved fast and yet with time for actual experiences in using the tools."

"I liked Dr. Stepp's presentation on the Wankel engine. It is a classic."

"The workshop staff's enthusiasm has spilled over to me now. I can hardly wait to use more of the ideas."

"The brainstorming ideas were refreshing--plus Sally's enthusiasm."

"The relaxed atmosphere was comforting. I liked the humor."

"'People helping people' seemed to be the theme of the whole workshop, as well as people helping children."

"Good group feeling of professional sharing and fellowship. No one played the role of a great authority--instead, a sharing of learning experiences."

"Most informative, presented in an interesting, non-threatening manner for all levels of participant sophistication."

"The presentations were very well prepared and highly stimulating. Dr. Stepp's presentation and his ideas are worth a million dollars."

"The media workshop has been a most valuable experience for me. Probably, the most important thing about it was the emphasis on MEDIA IS FUN."

"I really enjoyed the Nebraska staff--so much enthusiasm and zip!"

C. Follow-up Session

"I do feel that this follow-up session has been an essential part of the workshop. It has added some new dimension to my understanding of the unlimited ways one can utilize media. Besides, its good to see old friends again and discuss common problems."

"The follow-up workshop after the original workshop was very helpful. Also, our sharing ideas with the opportunity to receive suggestions and comments was very valuable."

"I think the follow-up workshop came a little too soon in the school year for me. I could not prepare

anything. On the other hand, the follow-up refreshed my mind and inspired me all over again. It was especially helpful to hear what others were doing in their areas."

"The feedback session was helpful in exchanging ideas. Perhaps, if it had been held a little later we would have had more time to develop materials."

D. Suggestions for Improvement

"More emphasis should be placed on the secondary handicapped students. Areas such as vocational education, mental and physical health, and all secondary subjects should be covered more extensively."

"I would have enjoyed a little more experimentation with videotapes. I feel unfamiliar with them and consequently am reluctant to attempt to use them."

"I would have liked to try the brainstorming on media use--real problem situations."

"Perhaps an evaluation or rating form would be helpful for use when conducting similar workshops."

"Maybe it would have been helpful on the follow-up to have refresher labs where maybe we could refresh ourselves with the particular media that interested us but through the lapse of time and unavailablity of equipment we now feel uncomfortable with. Videotaping is a good example."

"Perhaps a bibliography of materials or resources might be helpful."

"More for children with learning disabilities. Many teachers still insist they must learn to read."

"One criticism--not enough materials for everyone to do as much as they would have liked."

"Could have used more experience with lamination and doing color lifts from picture magazines."

"Perhaps more classroom type materials and magazines to work with during the lab sessions."

II. Follow-up Session

A. Schedule

By agreement of the staff and participants, a follow-up session was held on October 18 and 19, 1972. The purpose of this session was to evaluate the application of media competencies to CRC functions. Several of the original participants were unable to attend, but the follow-up workshop was characterized by the same enthusiasm as the summer session. Activities of the follow-up session were as follows:

Wednesday evening, October 18

Registration followed by a media presentation by Robert E. Stepp on the application of media to specific learning situations.

This was followed by group discussion on what had transpired since the summer session.

Thursday morning, October 19

"Organizing Inservice Training," George Propp. Continued review of activities.

Thursday afternoon, October 19

Brainstorming Session, Sally Snyder
Complete review of activities. Summarization and wrap-up.

B. Instructional Content

The three presentations made during this session are described below, and a summarization of CRC activities since June follows:

Robert E. Stepp

"Media Utilization in the Education of the Handicapped"

In this session, Dr. Stepp demonstrated with slides the impact that educational technology is having in the education of the handicapped. He showed slides of the various hardware that is becoming indispensable in education, and showed programs developed for specific learning tasks. The Project Life

equipment was demonstrated and there was considerable discussion on the implications of packaged materials. Other materials developed by the RIMC/SEIMC network were also demonstrated or described.

George Propp

"Systematic Organization of Inservice Training"

In this general session, Dr. Propp explained that the successful execution of inservice training requires the highest order of instructional communication. The basic idea is to make the greatest possible impact in the shortest possible time. For this reason, inservice training requires media competencies of the highest order. An additional complexity lies in the fact that in inservice training, we are more involved in the affective domain of learning.

The group then was taken through all the steps necessary for developing an inservice training workshop.

Media used was the overhead projector. With extensive audience participation, the group developed plans for a hypothetical workshop. The planning format was the same one used for concept development which is described in previous pages of this report.

Sally Snyder

"Brainstorming"

The brainstorming presentation was developed to stimulate creative thinking, to release thought from its many inhibitions. For this presentation, Ms. Snyder used a combination of slides, 8MM films, and transparencies. The pace was rapid, audience participation was maximized, and the enthusiasm of the instructor was one of the major components. The activities were so varied that it would be impossible to describe. Much of the media had been specifically developed for this purpose. Some of the visuals consisted of ink blots, others were puzzles, some were what might be called "visual absurdaties," and others were plain exercises in perception. Some of the highlights of the stimulating narration were as follows:

"....In other words, we set aside time to think about, ponder, produce and explore ideas. Plain ideas, absurd ideas, and ideas as they relate to educational media."

"We are going to relax your mind, limber up your gray matter, have you do some mental freewheeling. We want you to become uninhibited in your thinking."

"In this session, we will do general brainstorming, a form of mental calisthenics or physical education of the brain. It will be nonsense thinking during which your brain will become as limber as spaghetti."

"We are going to push around and rattle your marbles. We promise not to lose any of them."

"One reason why many of us tend to function less creatively as we mature is that we become victimized by habit. So true of teaching, with people teaching as they were taught."

"Many find it easy to exert themselves physically; and yet fewer ever try to exert themselves mentally."

"Practice brainstorming with your colleagues, with your family, with your friends. The lightning spark of thought, generated in the solitary mind, awakens its likeness in another. Mental freewheeling is contagious."

"Minds are like parachutes--they function only when open!"

C. Review of Participant Activities

Selected randomly from notes, the following statements describe some of the media activities that Institute participants had become engaged in since the summer session:

1. Production of a slide-sound presentation on architectural barriers for the physically handicapped.

2. Involvement of high school student in video-tape recording.

3. Students taught to use cameras and photographic results shown to a group of mothers.

4. Produced overhead transparencies for the development of motor skills in handicapped children.

5. Sound discrimination exercises recorded on tape recorder.

6. Used Visual Maker for seasonal concepts and for visual perception.

7. Copied some visual materials on slides to reduce bulk.

8. Helped teacher make own materials for a baby sitting kit.

9. Bought a Minolta Super 8MM camera and made a film on pigs. Sounds put on a tape cassette.

10. Made a movie film of local places of interest to be used before and after field trips.

11. Planning to make some slides into filmstrips.

12. Materials for coordination training for handicapped consisting of a transparency maze on a wall. Children find their way through the maze with a flashlight pointer.

13. Purchased Snapshooter kits for children. This created great interest among teachers. They are using the Snapshooter to improve motivation of non-readers.

14. Partially sighted are taking pictures for the class yearbook.

15. Made some slides of a camping trip and recorded sounds of the camping experience.

16. Requisitioned a Visual Maker and has since made 60 slides on "Beauty Around Us."

17. For teachers who have been using the overhead projector, the emphasis has been switched to coordinated media.

Because of the fact that some of the participants had changed positions and were adapting to new situations and new environments, many were not able to carry out the things they had in mind. However, there was a wealth of media planning on the drawingboards which participants want to carry out as soon as possible. Some of these plans are:

1. Development of a slide presentation on safety in riding buses and other vehicles to and from school.

2. Development in children of an awareness of their surroundings and having students communicate these things with a camera.

3. Making field trips more meaningful by using cameras during out-of-classroom experiences.

4. Development of a series of transparencies to teach teachers how to develop transparency production skills and to enhance utilization.

5. Collecting materials and ideas for inservice workshops.

Appendix

(This section of the report consists of handouts and other materials which may be useful as reference sources. Because of bulk and copyright problems, not all handout materials are included.) Enclosed materials are:

1. Workshop/Institute Proposal (Michigan Model)
2. Materials Mailed Directly to Participants
3. Form for Planning Boards
4. Photographic Terminology
5. Kodak 8mm Camera
6. Tripod, Camera and Lights
7. Your Camera and Animation
8. 2 x 2 Slides
9. For Better Pictures
10. Close-up Photography and Copy Work
11. Selection and Utilization of Learning Resources
12. Ways to Use Slides
13. Sources of Equipment and Materials
14. Publications

Workshop/Institute Proposal
(Michigan Model)

Special Study Institute #13

DEPARTMENT OF EDUCATION
Lansing, Michigan

A. Name of State Educational Agency

Michigan Department of Education, Special Education Services Area, Box 420, Lansing, Michigan 48902

B. Proposed Title of Institute

Media and Means for Curriculum Resource Consultants

C. Proposed Date and Length of Institute

Total of six (6) days; five days, June 19-23, 1972, at the University Inn, Trowbridge Road, East Lansing, and one day (to be determined) at a Lansing site for evaluation.

D. Tentative Award Area, Purpose, and Nature of Institute

1. All areas

2. To provide introduction, inspection, and awareness of opportunities on most facets of media, their content, construction, and appropriate use.

3. To continue the establishment for ongoing reinforcement of, and communication with, curriculum resource consultants.

4. To provide a one-day meeting in the fall of 1972 for follow-up and re-evaluation of information shared at the Institute.

5. To develop a meaningful document as a media resource.

E. Estimated Number and Types of Participants (eg., special education teachers, supervisors, or others)

Thirty

Criteria for selection of participants: 1)Must be qualified to accept, or have accepted, a position as a curriculum resource consultant; 2)Regional areas will also be a criteria for selection.

F. Other Pertinent Information

Site: University Inn, East Lansing, Michigan
Institute Director: Dr. Robert E. Stepp, University of Nebraska
Coordinator/Editor: Dr. William Mellon, U. S. Office of Education Regional Instructional Materials Center, Michigan State University
Staff Members: (6) To be selected by Dr. Stepp
Funding Agency: Ingham Intermediate School District

G. Budget Outline for Special Study Institute

1. Direct Costs

a. Personnel

	Amount
Director--6 days	No Charge
Assistant Director/Editor--10 days@$100	1,000.00
Staff (6)	No Charge
Michigan Department of Education Consultants	No Charge
Secretary	500.00
Sub Total	$1,500.00

b. Stipends

30--$15 per day for 6 days	2,700.00

c. Other Direct Costs

Transportation and housing for director and staff	850.00
Instructional supplies	
Materials for participants	3,000.00
Document, etc.	1,000.00
General supplies (paper, postage, etc.)	300.00
Total	$9,350.00

2. Indirect Cost

8% of Total Cost	748.00
GRAND TOTAL	$10,098.00

H. Reminders For Project Directors

1. A special study institute evaluation form (OE Form 9021) must be submitted within 4 weeks following completion of the institute.

2. Changes not to exceed 25% of the total institute budget may be made among line items.

Materials Mailed Directly to Participants

1. AV Instructional Materials Manual: A Self-Instructional Guide to AV Laboratory Experiences by James W. Brown and Richard B. Lewis. McGraw-Hill, 1969.

2. Here's How Series published by Eastman Kodak. There are eight booklets in the set; each participant received a complete set.

3. How to Make Good Pictures, Eastman Kodak.

4. Home Movies Made Easy, Eastman Kodak.

5. Nebraska Transparency Master Series. This set was produced by the Midwest Regional Media Center for the Deaf and printed at the University of Nebraska. The set includes transparency masters related to 22 different subject areas. A teacher's guide is included for each subject area.

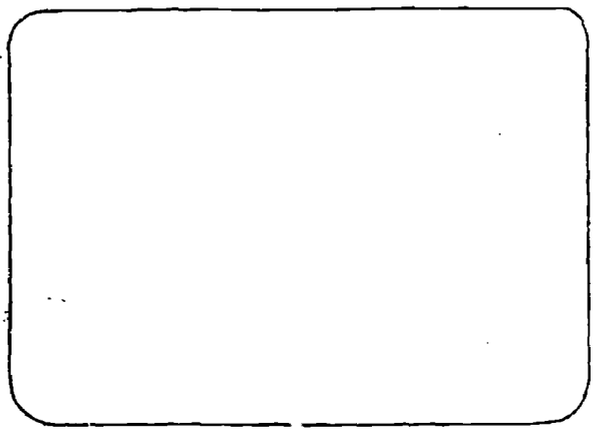
TV/FILM/SLIDE SEQUENCE PLANNINGBOARD

TITLE:_____ Page Number_____

PRODUCER:_____ of_____

INSTRUCTIONS: Visual in solid box; Description, Camera, Text, Special Instructions or Coordinated Media to the right of each box.

NO.__



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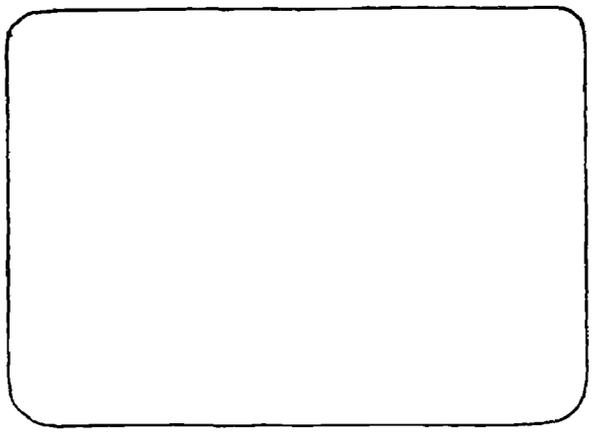

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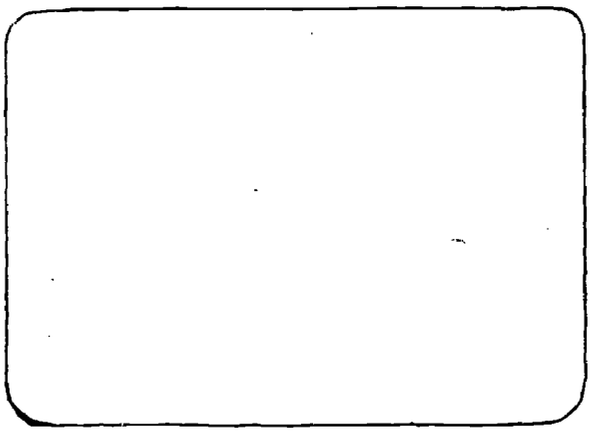

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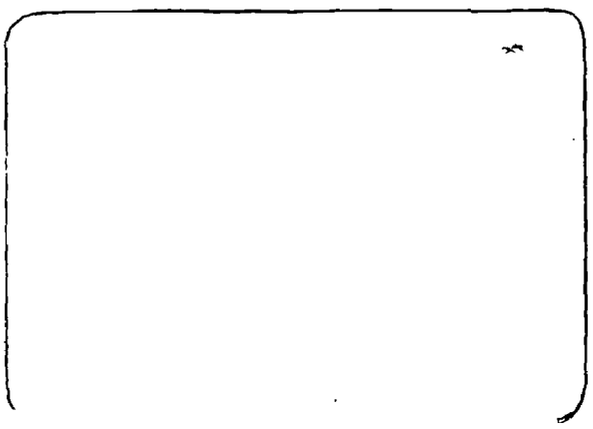


Photographic
Terminology

FRAMING. . . . . means to visually compose through the camera the scene you want to film. You include in the scene only those things necessary to communicate your message.

ESTABLISHING SHOT. . . . . to help viewer identify and establish himself to the viewing environment...to "set the scene"...shoot an initial segment about 6-8 seconds.

CAPTIONS . . . . . when filming title, labels...any material to be read by the viewer...expose the film at least 6-8 seconds or longer depending on required reading time.

LONG SHOT. . . . . introduces the audience to the background against which the action plays.

MEDIUM SHOT. . . . . is to show the important elements in a scene. It is the transition between the long shot and the close-up.

CLOSE-UP . . . . . pinpoints the important people or actions in a scene and eliminates everything else.

EXTREME CLOSE-UP . . . . . really gets to the nitty-gritty of what you're filming.

CUT. . . . . is used to move from one shot to another. When moving from shot to shot, change camera location and angle to give variety to the scene. (Shots are the small, individual filmed segments which make up a complete scene.)

TILT . . . . . when your camera is on a tripod, you physically tilt the camera vertically to move from the "bottom" of your subject to the "top" or vice versa.

PAN . . . . . is the horizontal movement of the camera along a single plane. It should be done slowly. Use this technique to follow moving action.

ZOOM . . . . . is a great advantage because you can move from a long shot to a close-up shot or vice versa without changing the camera position. But don't overuse this technique. When zooming you go from either wide-angle (far away) to telephoto (close-up) or vice versa.

SCREEN DIRECTION . . . . . concerns "flow" of action. Always have subject leaving and re-entering scene from correct direction.

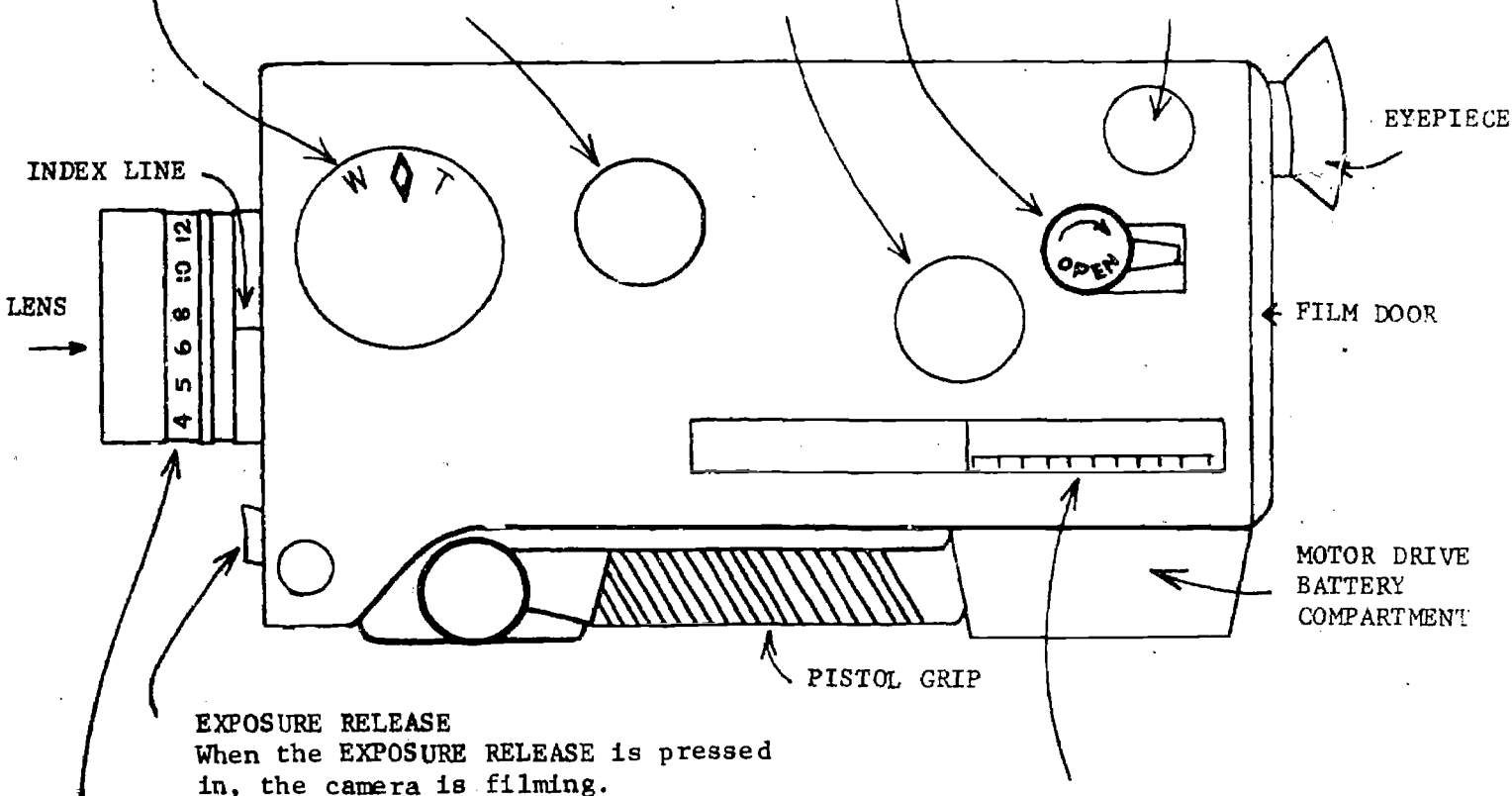
TIME TRANSITION. . . . . when doing a three and one-half minute film, sometimes it is necessary to collapse or condense time. In a finished film, by using cuts, screen direction and other filming techniques, the illusion of a long passage of time can be achieved in several short scenes. For example, if you wanted to film a person traveling from one location to another, quite obviously, you wouldn't film the entire drive. But to give the illusion of the person traveling from one place to another...to condense this time...all you need do is start with an establishing shot of the person getting in the car and driving out of the scene, cut to person driving, possibly another shot of the person driving (keep in mind screen direction), cut to person driving up to point of destination. Thus, what might have been a 20 minute ride if actually filmed, can be accomplished in 3-4 scenes in a matter of seconds.

KODAK INSTAMATIC M8

MANUAL ZOOM KNOB
Rotating the MANUAL ZOOM KNOB adjusts the lens to frame the scene desired. Rotating the MANUAL ZOOM KNOB zooms the lens from (T) telephoto to (W) wide-angle. The "◊" lens position is used for average picture taking.

FILM-DOOR LATCH
Push the FILM-DOOR LATCH down as indicated by the arrow marked open and swing open the FILM DOOR.

FINDER FOCUS KNOB
Rotating the FINDER FOCUS KNOB will adjust focus to sharpest image possible to correct for individual eye characteristics.

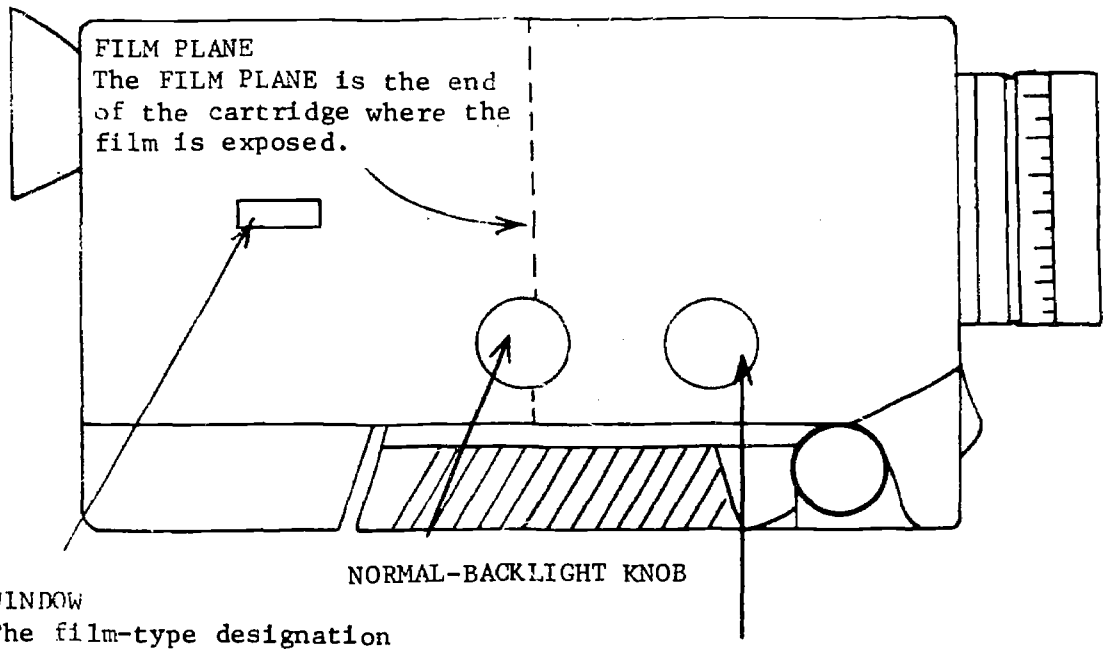


EXPOSURE RELEASE
When the EXPOSURE RELEASE is pressed in, the camera is filming.

FOCUSING SCALE
Focal distance is critical for close-up work like animation. The FILM PLANE-to-SUBJECT distance must be at least four feet and measured accurately up to eight feet. To focus the camera, rotate the FOCUSING SCALE to the correct "feet" opposite the INDEX LINE.

FILM-SUPPLY-INDICATOR WINDOW
When cartridge is dropped in camera, the FILM-SUPPLY-INDICATOR should be at "1". As you take pictures, the INDICATOR moves to show what portion of the film remains to be exposed.

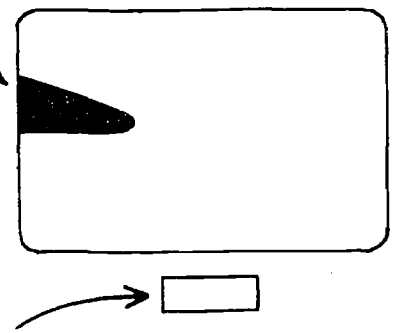
KODAK INSTAMATIC M8



WINDOW
The film-type designation on the cartridge label will appear in this WINDOW.

CAMERA-SPEED KNOB
The CAMERA-SPEED KNOB regulates the "frames per second." A setting of 18 is normal action. For animation, set on SF (single-frame). For slow motion, set at 32.

INSIDE THE CAMERA



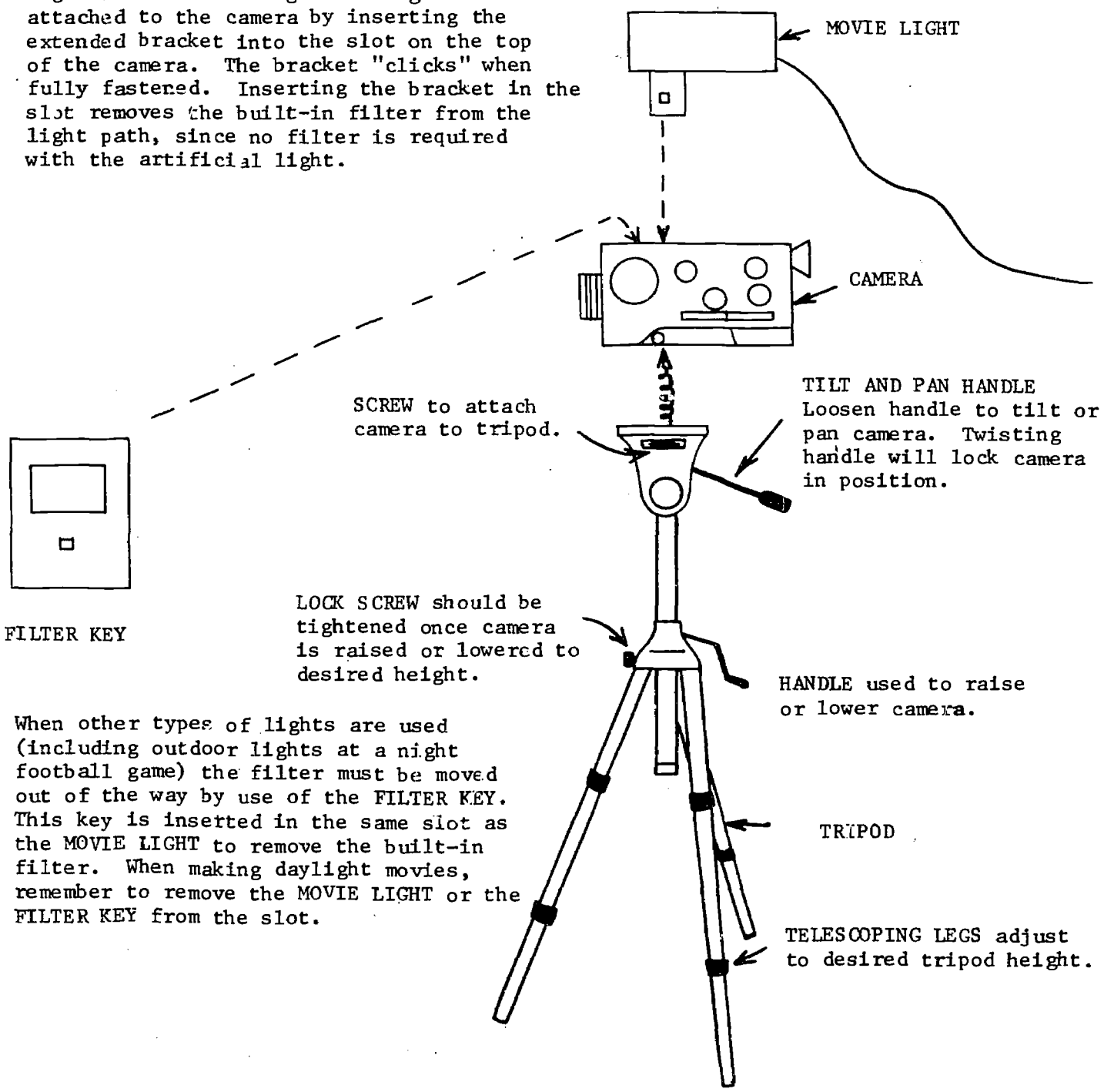
WARNING POINTER
A WARNING POINTER will appear at the upper-left corner of the VIEWFINDER WINDOW if there is not enough light for properly exposed movies.

VIEWFINDER WINDOW
The VIEWFINDER WINDOW is the opening through which you look to frame your subject. It shows what will be projected on the screen.

END-OF-THE-INDICATOR
Look through the rear EYEPIECE and note the small rectangular END-OF-THE-FILM INDICATOR window located below the VIEWFINDER WINDOW. When about three feet of film remains to be exposed, a red slide will begin to appear at the left side. When red fills this window, all the film is exposed.

TRIPOD, CAMERA and LIGHT

The MOVIE LIGHT is used when there is an insufficient amount of available light for movie making. The light is attached to the camera by inserting the extended bracket into the slot on the top of the camera. The bracket "clicks" when fully fastened. Inserting the bracket in the slot removes the built-in filter from the light path, since no filter is required with the artificial light.



When other types of lights are used (including outdoor lights at a night football game) the filter must be moved out of the way by use of the FILTER KEY. This key is inserted in the same slot as the MOVIE LIGHT to remove the built-in filter. When making daylight movies, remember to remove the MOVIE LIGHT or the FILTER KEY from the slot.

A L W A Y S U S E A T R I P O D

Your Camera and Animation

There are at least three ways in which a movie camera can be "adapted" for use in animation filming.

1. To use the single framing technique, a cable release is attached to the trigger of the camera. By depressing the cable release, one frame of film is exposed at a time. At least five single frame pictures are taken after each ½ inch move of the object(s) being animated. Don't forget to adjust the film speed knob to 9-SF (single frame).

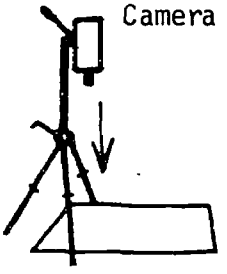
2. Simply "flicking" the trigger on your camera will also produce an animated film. In regular camera filming you depress the trigger for the duration of a scene. To animate, instead of holding the trigger down, just pop or flick the trigger. Between each flick, move the object(s) to be animated about ½ inch. When employing this technique, set the film speed knob on 9-SF (single frame).

3. Metal and magnets can greatly expedite the animation process. With this technique the background scene (on cardboard) is suspended above the floor. On each object to be animated there is a piece of metal attached to the backside. The illusion of animation is produced by using a magnet beneath the scene to move your inanimate objects. You depress and hold your camera trigger on as in regular filming. Leave the film speed knob on normal-18 frames per second.

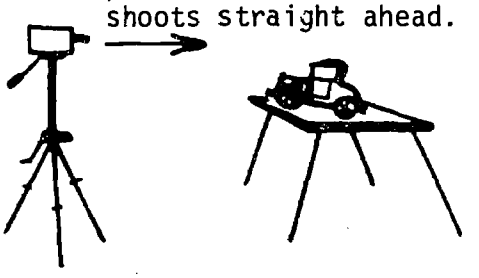
Animation Subjects and Filming Background

To achieve animation of inanimate objects, you can set up your "scene in at least three different ways.

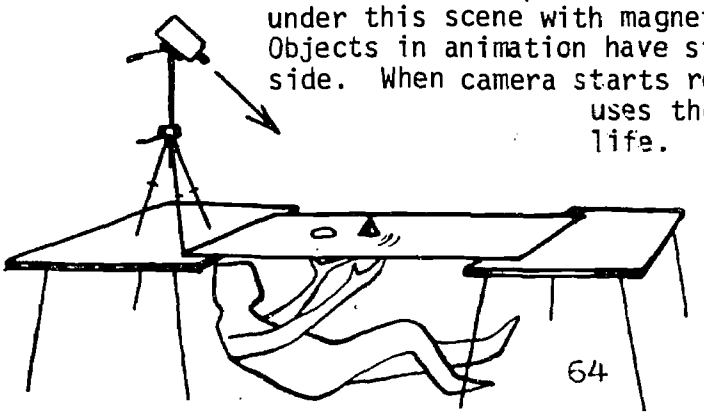
1. Objects to be animated can be flat and lay on the floor or other surface. Camera faces down on the scene.



2. Objects can be 3-d and placed on a table. Camera shoots straight ahead.



3. Metal-magnet technique. Objects lay flat on cardboard or other semi-thin surface. This surface is suspended off of the floor so a person can work under this scene with magnets. Camera is above the scene. Objects in animation have strips of metal attached to backside. When camera starts rolling, person under the scene uses the magnets to bring the scene to life.



MIDWEST REGIONAL MEDIA CENTER FOR THE DEAF

2" x 2" SLIDES

Purpose:

1. To motivate and arouse interest.
2. To stimulate creative expression.
3. To enhance "visual literacy".
4. To develop language.
5. To provide a heuristic learning experience.
6. To induce apperception.
7. To develop perception.
8. To modify and/or supplement commercial and prepared instructional materials.
9. To enable the teacher to provide for individual differences.
10. To illustrate a learning sequence.
11. To provide a change of pace.
12. To develop concepts that can't be verbalized.
13. To introduce a unit of work.
14. To illustrate and complement a presentation (teachers and/or students).
15. To prepare the class to see a motion picture.
16. To prepare the class for a field trip.
17. To involve the learner.
18. To contrast methods, time relationships, and physical relations.
19. To illustrate a story.
20. To provide an experience that is impossible to do on a field trip or duplicate in the classroom.
21. To provide prolonged observation.
22. To serve as a means for review.
23. To assess the learners' knowledge/abilities.
24. Etc., etc.

Rationale for 2" x 2" Slides:

1. Convenient to use.
2. Low in cost
3. Useful to solve your teaching needs, and the students' learning needs. (Tailor-made instruction.)
4. Students can easily utilize this mode of communication.
5. Ease of production.
6. Excellent color quality
7. Professional results.

Bibliography

Eastman Kodak Company
343 State Street
Rochester, New York 14650

A. Kodak Photo Information Books
   1. New Adventures in Outdoor Color Slides, AE-9, $.75
   2. New Adventures in Indoor Color Slides, AE-7, $.75
   3. Better Snapshots with Adjustable Camera, Ac-30, $.75

B. Kodak Advanced Photo Information Books
   1. Here's How, AE-81, $.75
   2. More Here's How, E-83, $.75
   3. The Third Here's How, AE-84, $.75
   4. The Fourth Here's How, AE-85, $.75
   5. The Fifth Here's How, AE-87, $.95
   6. Copying, 6th edition, M-1, $.75
   7. Producing Slides & Filmstrips, S-8, $1.00
   8. Flash Pictures, AC-2, $.95
   9. How To Make Good Pictures, 32nd edition, $1.25

FOR BETTER PICTURES

People take pictures to tell others what they see and feel. Years of experience have produced some basic ideas on how to tell these things through pictures.

I. A good picture has a subject--a reason for being. If you have to hunt for the subject, the picture is a poor one. So, before you shoot, be sure you know why you're taking the picture.

II. A better picture always has a point--a story to tell. Be sure your subject is so placed and your camera angle so set that the story will come through.

III. A better picture draws the eye to the thing you want emphasized. Your subject stands out. Make close-ups--move in to your subject, keeping the backgrounds simple and uncluttered.

IV. A better picture can be taken only after you remember to hold your camera steady, keeping the horizon level. When possible--frame your picture for better composition.

FOLLOW THESE RULES, BUT DON'T BE A SLAVE TO THEM--
BE CREATIVE!!

UNUSUAL LIGHTING SITUATIONS

THAT CAN MISLEAD AN AUTOMATIC CAMERA

When using an automatic camera, such as an Instamatic, there are several unique situations that may cause the metering system to "mis-read" the subject which will result in poor and improper exposure. Avoiding the following situations will help to overcome this common problem. If you can overide the automatic system--then do so.

I. Dark subjects against a light background.

II. Light subjects against a dark background.

III. Subjects against an overcast sky.

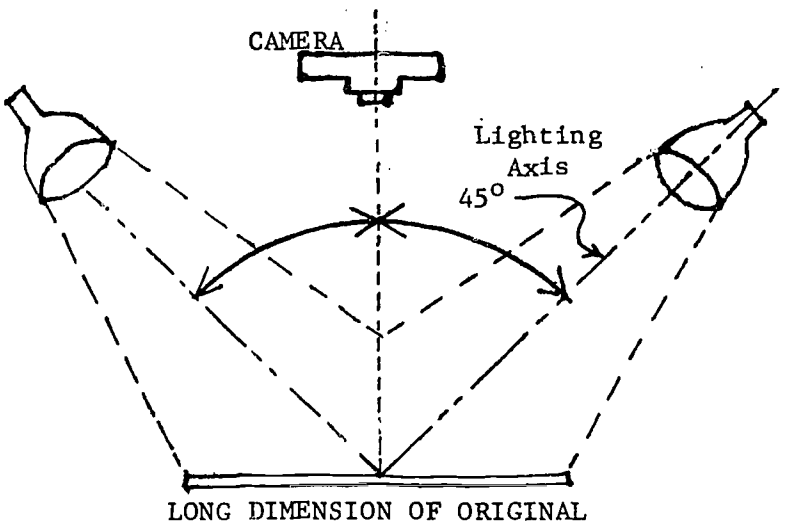
IV. Unlighted backgrounds (such as spot-lit subjects).

V. Subjects in the shade, with a sunlit background.

CLOSE-UP PHOTOGRAPHY AND COPYWORK

I. The Kodak Ektagraphic Visualmaker: A Kodak instamatic Camera on a special copy stand with its own built-in, prefocused supplementary lens for sharp, clear pictures. Also, each stand has its own built-in reflector that provides just the right amount of light from the flashcube to illuminate the subject. The Camera can be used off the copystands, in the usual manner.

II. 35mm Photocopying: Equipment and set-up.
- A. A 35mm Camera, SingleLens Reflex, with or without a meter.
- B. A light meter capable of taking an incident light reading, (if not built into the camera,---ifso always take a grey card reflected light reading).
- C. Light stands and reflectors with proper photo-floods. Goose-neck lamps are ideal with a No. 1 Photo-flood.
- D. Close-up lenses or extension tubes (or bellows).
- E. Filter for converting daylight film for use with photo floods (No, 80B). (Because of the longer exposure required when you use daylight film with a filter---it is reccomended that you use TUNGSTON film--requiring no filter.)
- F. A cable release.



Set photofloods on either side of camera, at about 45° angle to the center of copy, and each at the same distance from it. Look at the copy from camera's point of view. Copy must be fully and evenly lit. Shift lights until reflections are gone. If shooting copy under glass, use Polaroid filter to cut glare.

BASIC EXPOSURE with this set-up: High Speed Ektachrome film* 2 No. 1 Photoflood lamps and using close-up lens- *Tungston

$\frac{1}{50}$ Sec. @ f.5.6 to f.8

NOTES:

FOR HIS LEARNING INVOLVEMENT

1. Do you wish to display materials for prolonged study?
2. Do you wish to provide auditory experiences?
3. Do you wish to picture an object or a scene for detailed study?
4. Do you wish to visualize a concept or a situation for observation?
5. Do you wish to outline or give continuity to a variety of situations?
6. Do you wish to simulate learning experiences?
7. Do you wish for him to participate in the actual experience?
8. Do you wish for him to be creative in his response?
9. Do you wish for him to experience this learning event in the classroom, library, study carrel, home, community, or in the _____?

SELECTION AND UTILIZATION OF LEARNING RESOURCES

For display.....chalkboard, bulletin board, flannel board, hook and loop board

For audition.....speech, audio recordings (reels, cassettes, cards)

For symbology.....charts, graphs, maps, diagrams, cartoons

For iconography....slides, filmstrips,study prints, pictures

For observation....films (16MM and 8MM), television, video recordings

For coordination...overhead transparencies, texts, manuals

For simulation.....models, mock-ups, programmed learning, computer assisted instruction

For application....demonstrations, performance, field trips

For creation.....multi-media response modes

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"MEDIA FOR CURRICULUM RESOURCE CONSULTANTS"

June 19 - 23, 1972

WAYS TO USE SLIDES

Give the child the camera to express himself. Let him tell you through pictures what he sees and is interested in. For example, take the child to some place and let him take the pictures. You will then see the 'world' through his eyes. Let the child make an audiotape when he views the slides.

Record field trips for future use.

Show a sequence from beginning to end. For example, take slides of a garden over a period of a year to show the growing cycle.

"Lift" a picture, chart or map from a book and project it so that everyone can see it at the same time.

Copy a book so that all can share at the same time. Have children do the narration and/or artwork taken from this experience.

Use slides to analyze art work. It can be made large enough to select out every detail.

When displays are available in the immediate area, make pictures to use at a later date.

Take pictures of children doing projects in the classroom and of their art work. (Slides will last longer than papers.)

If you find a good story or an article in a magazine, copy and save it with slides.

Stimulate discussion with a slide or possibly a series of slides showing one at a time and discussing the slide content.

Take pictures of bulletin boards and/or posters. Keep them to duplicate. Use the same information again at a later date. Show them to parent groups.

If your room is set up in an interesting way, or you want to document something, record it on slides.

If you want children to take part in an experience, take related slides and have them walk through the motions. For example, take pictures of a stop light and have the children respond as it changes.

Show a complete overview of a subject. For example, show a plant at all stages of development.

Record important events on T.V. (i.e., guest speaker).

Bring experiences into the classroom to involve the children. Take pictures of signs for teaching of reading and reactions.

Use slides for tactile experience -- tracing letters or words. (Consider use of the rear projection screen.)

Bring anything you want into the classroom, things from around the house, community, vacations, etc.

Collect examples for concepts you are teaching. (If you are teaching colors, make some slides of various things of those colors.

Stimulate writing by setting the scene with a slide.

Set up an independent study station. Have the child view slides at his choice of time.

SOURCES OF EQUIPMENT AND MATERIALS

FROM MEDIA AND METHODS

16MM FILM

ACI Films, Inc.
Alms Instructional Media Services
Alemann Films
American Foundation Inst.
Association Films, Inc.
Association Instructional Materials
Atlantis Productions, Inc.
Audio Film Center/Ideal Pictures
Bailey-Film Associates
Bear Films, Inc.
Bee Cross-Media, Inc.
Benchmark Films, Inc.
Brandon Films, Inc.
Boston Educational Research Co.
Canadian Film Board
Carousel Films, Inc.
Cathedral Films
Center for Mass Communication of Columbia Univ. Press
Chelsea House
Churchill Films
Columbia Cinematheque
Contemporary Films/McGraw-Hill
Continental (Walter Reade)
Coronet Instructional Films
Creative Film Society
Walt Disney 16MM Films
Doubleday&Co., Inc.
Encyclopedia Britannica Corp.
Eye Gate House, Inc.
Film Associates of California
Films for the Humanities
Films, Inc.
Fleetwood Films, Inc.
Fordham Equipment & Publishing Co.
Gateway Productions, Inc.
Great Plains National Instructional Television Library
Grove Press Inc, Film Div.
Holt, Rinehart & Winston
IQ Films, Inc.
Indiana Univ. Field Servs. Dept.
Indiana Univ. AV Ctr.
Internat'l Educational Films
Internat'l Comm. Films
Internat'l Film Bureau
Internat'l Film Foundation
Jam Handy Org.
Janus Films
Journal Films
Learning Corp. of Amer.
Lyceum Productions
McGraw-Hill Films
Mass Media Associates
Modern Learning Aids
Modern Talking Picture Service
Arthur Mokin Prod, Inc.
NBC Educational Ent.
Nat'l Film Board Canada
New Dimensions in Educ.
Henk Newenhouse, Inc.
Paulist Prods.
Pyramid Film Producers
Radim Films, Inc.
Stuart Reynolds Prods.
Peter Robeck & Co.
Science Research Assoc.
Scott,Foresman & Co.
Al Sherman
Sierra Club
Smithsonian Institution
Sterling Ed. Films
Swank Motion Pictures, Inc.
Teaching Aids Service
Teaching Films Custodians
Thorne Films, Inc.
Trans-World Films
Twyman Films, Inc.
Universal Ed. and Visual Arts
United Artists Corp.
Visual Ed. Service
Warner Bros/7 Arts
John Wiley & Sons, Inc.
Yellow Ball Workshop

8MM FILM AND FILM LOOPS

Association Films, Inc.
Atlantis Productions, Inc.
Audio-Tutorial Systems
Bailey-Film Associates
Bee Cross-Media, Inc.
Stanley Bowmar Co., Inc.
Brandon Films, Inc.
CBS--Holt Group
CBS Learning Center
Carousel Films, Inc.
Cathedral Films
Canco Educational Films
Coronet Instructional Films
Denoyer-Geppert Co.
Doubleday & Co.
Ealing Corp.
Encyclopedia Britannica
Eye Gate House, Inc.
Film Assoc. of California
Fleetwood Films
Fordham Equipment & Pub. Co.
Heater and Assoc.
Houghten Mifflin Co.
Indiana Univ./Audio-Visual Ctr.
International Educational Films
Jam Handy Organization
Landmark Pictures, Inc.
Learning Corp. of America
J. B. Lippincott
Lyceum Productions
McGraw-Hill Films
Modern Learning Aids
Modern Talking Pictures Serv.
Arthur Mokin Productions
Nat'l Film Bd. of Canada
New York Univ. Film Library
Henk Newenhouse, Inc.
Popular Science Pub. Co., Inc.
Prentice-Hall, Inc.
Pyramid Film Producers
Rand McNally & Co.
Scott, Foresman & Co.
Society for Visual Educ.
Sterling Educational Films
Swank Motion Pictures, Inc.
Thorne Films, Inc.
Universal Ed. and Visual Arts
The Walden Film Co.
Weston Woods Studios, Inc.
John Wiley & Sons, Inc.

8MM PROJECTORS

Bell & Howell, Audio Visual Products
Califone-Roberts
DuKane Corp.
Eastman Kodak Co.
Fairchild-Industrial Products Division
GAF Corp.
Paillard Inc.-Bolex
Panacolor Inc.
Technicolor, Inc.
Viewlex, Inc.

16MM PROJECTORS

Bell & Howell, Audio-Visual Products
Eastman Kodak Co.
Graflex, Inc.
The Kalart Co., Inc.
Paillard Inc.-Bolex
RCA Instructional Electronics
Victor Animatograph Corp.
Viewlex, Inc.

PROJECTION SCREENS

Bro-Dan, Inc.
Da-Lite Screen Co.
Eastman Kodak Co.
Hudson Photographic Indus.
Radiant Corp.
Spitz Laboratories, Inc.
Tecnifax Corp./Visucom Div.
H. Wilson Corp.

FILMSTRIPS

Addison-Wesley Publ. Co.
Aims Instructional Media Serv.
Assoc. Instructional Materials
Atlantis Productions, Inc.
Bailey-Film Associates
Bee Cross-Media, Inc.
Benefic Press
Boston Ed. Research Co.
Stanley Bowmar Co., Inc.
Bro-Dart Inc.
CBS--Holt Group
Cathedral Films, Inc.
Cenco Educational Aids
Churchill Films
Colonial Films, Inc.
Coronet Instructional Films
Thomas Y. Crowell Co.
Denoyer Geppert Co.
Doubleday & Co., Inc.
Encyclopedia Britannica
Eye Gate House, Inc.
Filmstrip House, Inc.
Stuart Finley, Inc.
Follett Educ. Corp.
Fordham Equipment and Publ. Co.
Genl. Learning Corp.
Ginn and Co.
Grolier Educational Corp.
Guidance Assoc. Harcourt, Brace and World
D.C. Heath & Co.
Harper & Row Publ., Inc.
Houghton Mifflin Co.
Imperial Film Co.
Indep. Film Producers Co.
Internat'l Book Corp.
Internat'l Comm. Films
Internat'l Educational Films
Int'l Film Bureau, Inc.
Jam Handy Org.
Journal Films
Learning Corp. of America
Life Filmstrips
Lyceum Productions
McGraw-Hill Films
Media Plus
Charles Merrill Publ. Co.
Modern Learning Aids
Modern Talking Pictures Serv.
Moody Institute
Nat'l Film Bd. of Canada
New Dimensions in Educ.
New York Times Co.
Henk Newenhouse, Inc.
Pop. Sci. Publ. Co., Inc.
Potter's Photographic Applications Co.
Prentice-Hall, Inc.
Peter Robeck & Co., Inc.
Rand McNally & Co.
Sales Comm. Systems, Inc.
Scholastic Magazines
Science Research Assoc.
Scott, Foresman & Co.
Society for Visual Ed., Inc.
Spoken Arts, Inc.
Sterling Educational Films
Teaching Aids Service, Inc.
Teaching Technology Corp.
Universal Ed. & Visual Arts
Western Publ. Co. Inc.
Weston Woods Studios, Inc.

FILMSTRIP PROJECTORS

Bell & Howell, A/V Prod. Div.
Bro-Dart, Inc.
Charles Beseler
Ceneco Educational Films
DuKane Corp.
Graflex, Inc.
Hudson Photographic Indus.
The Kalart Co.
LaBelle Industries
T.M. Visual Industries, Inc.
Victor Animatograph
Viewlex, Inc.

RECORDS AND TAPES

Addison-Wesley Publ. Co.
Allyn & Bacon, Inc.
Benefic Press
Bowmar Records, Inc.
Stanley Bowmar Co, Inc.
Bro-Dart, Inc.
John D. Caddy
Caedmon Records, Inc.
DCA Educational Products
Doubleday & Co., Inc.
Encyclopedia Britannica Educ.
Enrichment Teaching Materials
Eye Gate House, Inc.
Filmstrip House, Inc.
Folkways Records
Follett Educ. Corp.
Fordham Equipment & Publ. Co.
Gen'l. Learning Corp.
Ginn & Co.
Glencoe Press, Div. of Macmillan Co.
Harcourt, Brace, & World
Houghton Mifflin Co.
Imperial Internat'l Learning
Jam Handy Org.
McGraw-Hill Book Co.
Modern Learning Aids
Pioneer Record Sales, Inc.
Pitman Publ. Corp.
Silver Burdett, Co.
Society for Visual Educ.
Spoken Arts, Inc.
Teaching Aids Service, Inc.
Universal Educ. and Visual Arts
Viewlex
Weston Woods Studios, Inc.
H. Wilson Corp.

RECORD AND TAPE MACHINES

Ampex Corp.
Audio-Tutorial Systems
Audiotronics Corp.
Bell & Howell, Audio-Visual Products Div.
Boston Educ. Research Co.
Califone-Roberts
Concord Electronics Corp.
Internat'l Audio Visual Co.
Chas. Merrill Publ. Co.
Mincom Div./3M Co.
Newcomb Audio Prod. Co.
North Amer. Phillips Co.
RCA Instructional Electronics
Sales Comm. Systems, Inc.
Sony Corp. of Amer. VTR Div.
Tandberg of America Inc.
Teaching Technology Corp.
Telex Comm. Div.
V-M Corp.
Viewlex Corp.

TRANSPARENCIES

Aevac, Inc.
Allyn & Bacon, Inc.
Bee Cross-Media, Inc.
Benefic Press
Charles Beseler Co.
Stanley Bowmar Co. Inc.
Cenco Educational Aids
Civic Education Service
Creative Visuals
Colonial Films, Inc.
DCA Educational Products
Denoyer Geppert Co.
Doubleday & Co.
Encyclopedia Britannica Educational Corp.
Eye Gate House, Inc.
Filmstrip House, Inc.
Follett Educ. Corp.
Fordham Equip. & Publ. Co.

OVERHEAD PROJECTORS

Bell and Howell, Audio-Visual Prod. Div.
Charles Beseler Co.
Buhl Projector Co, Inc.
GAF Corp.
Graflex, Inc.
3M Co/Visual Products Div.
Projection Optics Co.
Tecnifax Corp./Visucom Div.
H. Wilson Corp.

TELEVISION EQUIPMENT

Ampex Corp.
Apeco Video Systems Div.
Comspace Corp.
Concord Electronics Corp.
Craig Corp.
Diamond Power
GBC Closed Circuit TV Corp.
Fairchild Camera & Instrument
International Video Corp.
Graflex, Inc.
Jerrold Electronics
The Kalart Co.
Mincom Division/3M
Philips Broadcasting Equipment Corp.
Packard Bell Electronics
PanasonicVTR/CCTV
RCAInstructional Electronics
Raytheon Learning Systems
Reeves/Actron
Sylvania Electric Prods.
Shibaden Corp. of America
Sony Corp. of America
TeleMation, Inc.

PUBLICATIONS

The following publications can be ordered from:

CEC Information Center
1411 S. Jefferson Davis Highway
Suite 900
Arlington, Virginia 22202

A Selected Guide to Public Agencies Concerned with Exceptional Children, June 1971; compiled by the CEC Information Center. FREE upon request.

This publication includes an annotated directory of public and private organizaions whose services relate to exceptional children.

A Selected Guide to Government Agencies Concerned with Exceptional Children; April 1971; compiled by CEC Information Center and Special Education IMC/RMC Network Office. FREE upon request.

This publication lists government agencies involved in activities related to the handicapped.

Directory of Federal Programs for the Handicapped; April 1971; CEC. Price: 2-9 copies-$1.00 each (first copy complimentary); 10 or more--.50 each.

A compilation of all Federal Programs designed specifically to serve physically and mentally handicapped persons.

Insight; CEC; Subscription rate--$25.00 per year, $45.00 for 2 years.

CEC's legislative information service which includes a monthly newsletter and supplemental reports about federal programs, policies, and personnel affecting handicapped and gifted children. It is devoted exclusively to what's happening in Washington for the education of exceptional children, why, and what it means.

Digest of State and Federal Laws: Education of Handicapped Children; edited by Elaine Trudeau; State--Federal Clearinghouse for Exceptional Children; Oct. 1971. Price: $8.25 (Combination of Digest of State & Federal Laws...and State Law and Education of Handicapped Children: Issues & Recommendations.)

This digest of federal and state laws relating to the education of handicapped children is divided into two parts. Part I presents, in digest form, the laws of the 50 states and the District of Columbia. Part II is a digest of federal laws which have particular relevance to the education of handicapped children.

State Law and Education of Handicapped Children: Issues and Recommendations; Fred Weintraub, Alan Abeson, David Braddock; CEC; Oct.,1971. Price: $8.25 (Combination of Digest and State Laws) (see previous notation)

This booklet is intended to serve as a guide and to lend direction to those seeking to change law in order to provide all the benefits and guaranties of an education to handicapped children that is presently available to other children.

The following publications can be obtained from:

Superintendent of Documents
U.S. Government Printing Office
Washington, D.C. 20402

Monthly Catalogue; U.S. Government Publications; Price: .75 per copy except December issue (Index) which varies in price. Subscription Price: $7.00 per year (including Index)

Contains listing of all governmental publications (excepting administrative and confidential or restricted). Each issue contains a listing of government authors, which is actually a listing of the individual departments, bureaus, offices and agenciesof the Federal Government. Also included in each issue is a preview of documents which are in the process of being printed.

Selected Sources of Inexpensive Mental Health Materials, National Clearinghouse for Mental Health Information Chevy Chase, Maryland; 1970. Price: .40 per copy--Public Health Service Publication No.1911.

This directory provides an annotated list of publishers of educational materials in mental health. It also includes an alphabetical listing of organizations; a listing of state and territorial organizational mental health units; and a listing of religious and service organizations.

A Summary of Selected Legislation Relating to the Handicapped; 1971; U.S. Dept. of Health, Education, and Welfare; Ms. Patricia Reilly Hitt, Asst. Secretary for Community and Field Services; Washington, D.C. 20201; October, 1971. Price: .20, Stock Number 1760-0103.

Contains brief summaries of legislation enacted by the 91st Congress which offer specific benefits to physically and mentally handicapped persons. It also cantains 2 appendices. Appendix A contains a table which traces the development of each law through the legislative process. Appendix B provides cross references to individual summaries of laws found in the 1963-1967 and the 1968 federal legislative summaries.

The following publications can be obtained from:

U.S. Dept. of Health Education and Welfare
Secretary's Committee on Mental Retardation
Washington, D.C. 20201

Directory of State and Local Resources for the Mentally Retarded; December 1969. FREE upon request.

This publication lists, by states, those facilities and other resources which render specific services to the mentally retarded. It gives information about the following types of agencies:

1) Mental Retardation State Coordinating Agencies
2) State Agency Administered Programs Related to the Mentally Retarded
3) Non-Governmental State Resources
4) Clinical Programs for the Mentally Retarded
5) Residential Facilities for the Mentally Retarded
6) Special Facilities

Mental Retardation Publication of the Department of Health, Education and Welfare, May 1971. Price: FREE upon request.

This annotated bibliography was prepared by the Secretary's Committee on Mental Retardation for the purpose of providing information about those publications primarily concerned with mental retardation. It also included a section on "Periodicals" and a section on "Sources of Information."

The following publications can be obtained from:

Office of Federal Relations
Extension Hall Annex
University Campus
Corvallis, Oregon 97331

Developing Skills in Proposal Writing; Mary Hall; Sept.1971. Price: $10.00 per copy.

A basic guide to the preparation of proposals.

Sources of Information on Funds for Education; Second edition, Feb.1971. Price: $5.00 per copy.

An annotated bibliography of governmental and commercial documents and newsletters providing information on support programs of federal agencies, private foundations, and professional associations.

Federal Notes; Price: $17.00 per year; $12.00 per year bulk rate (10 or more subscriptions).

Newsletter, published 24 times per year, which provides a capsulized summary of activities affecting sources of funds for education.

Foundation Directory; Edition 4, April, 1971. Price: $12.00.
Order from: Basic Books, Inc.
404 Park Ave. S.
New York, New York 10016

This document lists the private foundations in the United States, including the address, the names of the director and the major operating area of areas the foundation is interesting in funding.

Foundation News; Bi-monthly publication, Subscription Price: $6.00 per year; Order from: The Foundation Center
444 Madison Avenue
New York, New York 10022

This bimonthly magazine provides information about activities of private foundations. Each issue lists recent grants in major fields, giving the name of the foundation making the award, the organization receiving the funds, the amount of the grant, and a brief description of the purposes of the program.

Follow-Through--Project Directory, School Year 1970-71; July 1970. FREE upon request. Order from: U.S. Dept. of Health, Education and Welfare
400 Maryland Ave. S.W.
Washington, D.C. 20202

This directory lists by states, the grant recepient, the local directorand program sponsor.

Planning for the Evaluation of Special Education Programs; September, 1969. FREE upon request. Order from:
Division of Services
Bureau of Education for the Handicapped
U.S. Office of Education
Washington, D.C. 20202

A resource guide designed to provide assistance to anyone who has the responsibility of making decisions about whether to initiate, promote, introduce, and/or judge a program for handicapped children. Also contains a bibliography of references on evaluation.

Encyclopedia of Associations; Gale Research Company; Price: $20.00. Order from: Gale Research Co.
Book Tower, 1249 Washington Bvld.
Detroit, Michigan 48226

Federal Programs Assisting Children and Youth; 1968. FREE upon request. Order from: Children's Bureau, Social and Rehabilitation Service
Dept. of Health, Education and Welfare
330 Independence Ave. S.W.
Washington, D.C. 20201

This booklet summarizes federal funds for programs assisting children and youth, by agencies and categories.