

DOCUMENT RESUME

ED 085 335

SP 007 474

TITLE Training Program for Instructional Assistants. A Guidebook for Trainers.
INSTITUTION Merrimack Education Center, Chelmsford, Mass.
SPONS AGENCY Office of Education (DHEW), Washington, D.C.
PUB DATE [72]
NOTE 99p.
EDRS PRICE MF-\$0.65 HC-\$3.29
DESCRIPTORS *Paraprofessional School Personnel; *Teacher Aides; *Training; *Training Objectives

ABSTRACT

This document is a guidebook developed by the Merrimack Education Center from actual experience in a pilot training program for paraprofessionals. It is stated that the purpose of the guidebook is to introduce to training facilitators some of the essential elements in preservice training. Section 1 justifies the existence of instructional and clerical aides and outlines some current needs in public schools which can be met by their increased use. A second section describes the recruitment and selection of trainees (interested individuals with time on their hands) and the implementation of the Merrimack program itself. Appendixes provide a workshop outline, suggestions for gaining public acceptance, training materials, related bibliographies, and questionnaires. Four tables of data are also presented. (JA/JB)

ED 085335



TRAINING PROGRAM FOR INSTRUCTIONAL ASSISTANTS

A GUIDEBOOK FOR TRAINERS

U.S. DEPARTMENT OF HEALTH,
EDUCATION & WELFARE
NATIONAL INSTITUTE OF
EDUCATION
THIS DOCUMENT HAS BEEN REPRO-
DUCED EXACTLY AS RECEIVED FROM
THE PERSON OR ORGANIZATION ORIGIN-
ATING IT. POINTS OF VIEW OR OPINIONS
STATED DO NOT NECESSARILY REPRE-
SENT OFFICIAL NATIONAL INSTITUTE OF
EDUCATION POSITION OR POLICY.

MERRIMACK EDUCATION CENTER
101 Mill Road
Chelmsford, Massachusetts 01824

(Title III - ESEA)

SP 007 474

TABLE OF CONTENTS

	<u>Page</u>
Foreword.....	11
I. Paraprofessionals in Perspective	
1. Educational needs.....	2
2. Instructional Aides as Members of a Teaching/Learning Team.....	5
3. The Teacher as Diagnostician and Facilitator.....	9
II. Carrying Out the Training Program	
4. Gaining Public acceptance.....	14
5. Recruitment and Selection.....	16
6. Description of the Population.....	19
7. The Training Program.....	21
8. Course Outline.....	24
Appendices.....	
I. Workshop Outline.....	28
II. Gaining Public Acceptance.....	33
III. Materials for Trainees.....	47
IV. Bibliographies and Glossaries.....	56
V. Evaluation Questionnaires.....	76
VI. Training Experience of the Merrimack Education Center.....	86
Tables	
1. The Role of the Paraprofessional-Instruc- tional Assistant.....	8
2. Previous Occupation of Trainees.....	20
3. Educational Background of Trainees.....	20
4. Lesson Plan.....	23

FOREWORD

The instructional assistant appears to be becoming a permanent part of the educational system. As the field of education moves towards "individualized" approaches there is encouraging evidence that carefully selected and properly trained assistants are capable of assuming greater responsibilities than was originally thought.

When one examines all the skills and attitudes which must be developed in a training program for instructional assistants, the tasks for trainers (facilitators) are monumental. Attracting prospective aides who are motivated to learn and who possess empathy for working with children enables great progress to evolve over short periods of time. Much of this program is initially generated by the training program itself, but eventually results from the individual assuming responsibilities for his own learning. It suggests also that there must be both pre-service and in-service opportunities for instructional assistants.

This guidebook has been developed by the Merrimack Education Center from actual experience in a pilot training program for instructional assistants. It has been compiled in guidebook form in order to introduce to training facilitators some of the essential elements in pre-service training. Trainers will find it useful to read through this document and to select those parts of it that are pertinent to their own situations.

Experience from the pilot program and knowledge gained from the literature suggests that school systems should give immediate attention to the role of trainer-facilitator in the field of instructional assistants.

This publication is the result of:

- ..The creative leadership of the Program Coordinator and the Training Instructor
- ..ESEA Title III -- Massachusetts Department of Education
- ..The twenty communities of the Merrimack Education Center
- ..Professional Cooperation.

It is impossible to thank by name every person who has made substantial contributions. Hopefully this modest note will serve as a token, however inadequate, to express the Center's gratitude.

Merrimack Education Center
1972

I

PARAPROFESSIONALS IN PERSPECTIVE

1. EDUCATIONAL NEEDS

Every year, several hundred thousand American students drop out of secondary schools, never to return. This represents a wasted human resource of large proportions. For a high percentage of these dropouts can learn -- though perhaps not in the formal classroom lecture environment that has been a characteristic feature of American education.

Research has clearly shown that although these students may not respond to group teaching methods, they do respond to individualized instruction. Many are problem learners, the technical nature of whose difficulties is only now becoming clear. Many of the latter class are clearly of normal intelligence.

It is not economically feasible to hire enough teachers to give all students individual tutorial instruction all the time. But, an alternate solution is rapidly becoming apparent. Problem learners will respond positively to almost any sympathetic adult attention from whatever source. And there exists a ready source of such adults in any community with schools. They consist of interested individuals with time on their hands -- mothers whose children are grown, mothers whose children have learning problems, widows, even ex-stewardesses with no children of their own.

Experience has shown that these individuals can be appropriately trained to be effective teacher's aides. They can fill the gap that exists between the harried professional teacher and the educationally handicapped youngster. The results now being accomplished by this method are almost always encouraging. They are sometimes very good, and frequently heartwarming. For it lies within the power of many a teacher's aide to turn an incipient human tragedy into one of life's minor miracles.

There has been a heightened awareness of individual learning needs, not just in problem learners but in the general student population. In fact, it may be said that the dominant reality in American education today is the awareness of individual difference. And, along with this heightened awareness, we now have better diagnostic procedures. The latter highlight the need for assistance within the classroom. It is a clearly-identified educational need, and there has been growing pressure to do something about it.

The move to use teacher's aides to fill this need is already widespread. Such innovative programs as "Closer Look"

and "The Association for Children with Learning Disabilities" have placed renewed emphasis on the parental role in defining the needs and identifying the children who are having learning difficulty. The National Congress of Parents and Teachers has estimated that the schools will be using more than a million paraprofessionals by 1976.

The primary advantage of using Auxiliary personnel in schools is that it allows teaching to accommodate itself to the individual differences that exist between pupils. There are other benefits, such as the improved use of the time of the professional staff. The use of parent educators, clerical aides, instructional assistants, teacher interns, and aides in pre-school child development and day care -- all may contribute to improving the quality and availability of educational services.

There is still some scattered resistance to differentiated staffing models, and this has slowed the use of paraprofessionals. But, it may be that the educators will follow the example of the medical profession in this instance, and the problem will resolve itself. Paraprofessionals have long been accepted in the medical profession, and their use has served to improve the effectiveness of the professionals. This is illustrated in nursing, where the role of the paraprofessional is institutionalized, and volunteers and paid aides are effectively employed to free the registered nurse for a more responsible position while at the same time providing comprehensive services. More secure in its acceptance, the profession of medicine has been able both to deploy an array of paraprofessionals and to make systematic provision for their training.

The use of paraprofessionals will bring with it changes in the traditional role of the classroom teacher. These changes are being brought about simultaneously for other reasons. Changes are occurring rapidly in almost every aspect of the curriculum. This fact, along with increased utilization of audiovisual aides and teaching machines, has placed an increasing demand upon the teacher's time. Teachers will be increasingly reluctant to spend valuable time on duties which can be done as well by semi-skilled assistants. They will need increasing amounts of time for strictly professional duties. The new concept of the paraprofessional's role is that of facilitator of instruction rather than a lecturer -- a facilitator, and a diagnostician of individual learning needs.

As was mentioned, the tendency toward acceptance of paraprofessionals in the classroom is growing. Development of the Multiunit School (IGE) and its implementation nationwide has furthered the acceptance of differentiated staffing models and

with it, of course, the utilization of paraprofessionals.

But, if this is to happen -- if aides are to have a worthwhile place in the educational system -- it is up to the professionals to take a decisive role in recruiting them, and in selecting and training them. The move to institutionalize aides has already started. A recent NEA Task Force on auxiliary personnel in the schools has recommended that the by-laws be amended as necessary to provide for a special individual membership, or affiliate organization, or both, for auxiliary personnel, a move that would substantially enhance the acceptance of paraprofessionals as members of the educational team.

There are difficulties to be overcome, it is true. Training programs have not kept pace with the utilization of paraprofessionals nationwide, and their preparation is often far from adequate. And, there are further difficulties for administrators, principals and teachers in the deployment of paraprofessional personnel. These difficulties range from problems of job titles, salaries, and training components to concern for certification.

Provision for continuing in-service training, in addition to pre-service training and practicum experiences, is presently a crucial need. The report of Task Force II of the Department of Health, Education and Welfare -- a "blueprint for action" -- recommends that schools and clinics incorporate in-service training to prepare such paraprofessionals.

Pre-service training is increasing in momentum, as evidenced by the present training manual. But, successful utilization of this potential manpower source will require continuing leadership by local principals and teachers. They can supplement the training of the aides by in-service staff development programs that provide career development opportunities for the paraprofessionals. Without this leadership, the program may well wither. With it, it is assured of success.

2. INSTRUCTIONAL AIDES AS MEMBERS OF A TEACHING/LEARNING TEAM

The Multiunit School incorporates two categories of paraprofessionals within the school organization: the instructional aide and the clerical aide. Their job descriptions are, in general, as follows:

1. The Instructional Aide. This is a paraprofessional member of the Unit Staff who, working under the direction and supervision of the teachers, performs various routine duties often involving pupils. These duties, depending on the experience and skills of the aide, may include administering and scoring tests, helping students find and work with instructional materials, supervising in large classrooms and learning resource centers, etc.

2. The Clerical Aide. A paraprofessional member of the Unit Staff whose duties are primarily secretarial. Aides relieve teachers from routine, monitorial, and clerical duties; assist in the preparation of instructional materials; and assist in organizing and maintaining the instructional setting.

Since this report is primarily concerned with the instructional aide, the following remarks will be confined to that category.

Instructional aides find their greatest utility in situations where it is necessary to give individual attention to students who are problem learners. Despite the vagaries of the aides' backgrounds, they definitely can be trained to assist with instructional tasks. This has been demonstrated in differentiated teaching environments; one, for instance, with a team consisting of a master teacher, three or four regular teachers, and assorted teaching interns and instructional assistants. The use of aides may even be critical to the success of the educational project. For instance, where differentiated teaching techniques for many groups are involved, the development of paraprofessional groups can be a prime consideration in the management of individualized instruction.

In training the instructional aide, it should be borne in mind that what is being trained is a teacher's assistant, not a "tutor." The teacher remains in charge and maintains responsibility for the child's overall educational program and progress. This approach is significantly different from that in which a tutor is given complete charge of a child for anywhere from one to three hours per week and the child is no longer the teacher's responsibility. Under tutorship conditions, the child, when he

rejoins the class, may be left to flounder for the remaining hours of the week. This is due to the fact that the specialized help he receives may have no relation to classroom activities, and the pupil is thus unable to integrate his tutorial experiences with his group experiences.

With this in mind, we can now look at the other side of the coin, which is that the aide does perform instructional tasks. Though not a stand-alone tutor, she nevertheless performs work that is tutorial in nature. This is an important part of her motivation, the prime reward for getting involved with schools being the interaction between pupil and teacher. Because of this consideration, a balance should exist in the aide's activities between those tasks that impinge directly on the teaching-learning process, and those that are routine or clerical in nature.

Within the guidelines suggested above, the functions of the aide are mutually worked out between the teaching members of the team and the aide. As a general rule of thumb, the paraprofessional can perform any task not requiring a professional's training or judgment. Role definitions are developed in such a way as to consider the needs of individual teaching/learning situations. Flexibility is the order of the day. It is not the purpose of a training program to create a rigid structure. The point is to utilize to best advantage the unique talents of the individuals comprising the teaching/learning team.

Local autonomy is necessary for the success of the program. The local school faculty should determine what responsibilities the paraprofessional personnel should have and what duties they should perform. These will depend upon the conditions of the assignment; i.e., the grade, subject, the professional in charge, the type of community, and the training and experience of the aides. Job descriptions should not be so rigid that the teacher cannot explore new functions for the aide while classroom work is in progress.

Ultimately, the individual teachers determine what roles assistants have within a particular classroom. As the teacher becomes more familiar with the specific talents of the aide, as well as the strengths and weaknesses of the pupils, she will be better able to assign activities for the assistant to perform. In this way, the tasks assigned will be spelled out so that they will adapt to the needs of the individual situation and, above all, to the individual learner.

Going into more detail on what can be expected of the teacher's aides, it can be stated that the following major

categories of duties can be performed by them:

1. Instructional support. The paraprofessional assists implementation of the instructional activity that has been prescribed by the teacher.
2. Assistance with resource materials. The paraprofessional offers support involving the use of audiovisual equipment and other resource materials and media in carrying out the teacher-prescribed activities. This may include preparation and assembly of materials.
3. Conferences with the teacher. These are to report observations which will aid the teacher in diagnosing and assessing progress of the individual pupil.

The aide's duties are more explicitly defined in Table 1. The initial step of conferring with the teacher is crucial to the success of the program. That, and the daily summaries of educational progress and recommended follow-up are essential to maintaining integration with the classroom situation and transfer of the special training into the context of the larger group. In short, the aide is expected to accept assignments, perform instructional tasks, and then report back to the teacher as to the progress made. The teacher becomes, thereby, cognizant and accountable for the child's overall program.

TABLE 1

THE ROLE OF THE PARAPROFESSIONAL --
INSTRUCTIONAL ASSISTANT

- I. Conferring with the teacher regarding:
 - a. gaining further insight into pupil needs
 - b. understanding and evaluating a pupil's needs
 - c. identifying pupil's emotional, and social needs in addition to educational/academic needs
 - d. structuring observations of pupils to determine the individual child's needs.

- II. Planning and conducting individual sessions with the pupil to enhance classroom learnings
 - a. assisting implementation of the program based on pupil needs as diagnosed by the teacher
 - b. adjusting the program based on interest level of the particular pupils
 - c. planning instructional activity based on educational findings as reported on the individual pupil protocol.

- III. Planning and conducting group sessions (with a maximum of 5 to 6 pupils) to be based upon the following:
 - a. students' achievement levels
 - b. students' diagnosed needs (as diagnosed by the teacher) and skills which the pupils need in common
 - c. The interest levels and personality characteristics of the pupils
 - d. on-going observations, evaluations, and prescriptive strategies

- IV. Observing pupil's needs during individual and group sessions
 - a. observation of pupil's functional skills
 - b. informal (pupil performance) observations
 - c. informally assessing pupil work samples

- V. Conferring with the teacher regarding pupil skill mastery and progress
 - a. anecdotal record-keeping to report progress of the pupil (summary of activities)
 - b. integration and transfer of skills taught with on-going classroom program
 - c. continuous progress as skills are mastered

3. THE TEACHER AS DIAGNOSTICIAN AND FACILITATOR

The concept of differentiation in education gives the traditional teacher an opportunity to view herself in a new and perhaps more glamorous role. Differentiated staffing can be the simple instance of one teacher assisted by one aide. The aide would be an individual who gives increased personal attention to children with learning problems. The teacher will still need to provide the diagnosis for which the aide applies the remedy; but, the teacher's part in the classroom drama is subtly changed by the introduction of the aide. We see her in a somewhat different role, that of diagnostician.

Where the concept of differentiation is more fully developed, we find Multiunit Schools staffed by teaching teams. A master teacher will chair the team. Working with her (or him) will be teachers and teacher's aides. With this scheme fully implemented, we see the teacher clearly in a role that was already implicit in the first example. Many educational resources are being marshalled: specialized staff, diagnostic tools, and the full gamut of teaching materials. The individual teacher cannot personally administer the full range of these resources to all pupils for whom she is responsible. But she can see to it. She can become a facilitator whose business it is to orchestrate the pupils and resources into a harmoniously-interacting environment.

All these principles apply one way or another wherever paraprofessionals are used to help children with learning difficulties. Attention to the detail of the thing will make this clear. The presence of aides (or, if you prefer, paraprofessionals) is synonymous with differentiated techniques. Aides implement diagnoses; they, therefore, free the teacher for the function of diagnosing. But in such an environment, the teacher must improve her diagnostic skills and must accustom herself to the task of supervising aides.

Experience has shown that teaching occurs in all adult-child interactions, so that it is impossible in practice to exclude the aide from the teaching process. Nevertheless, the teacher is legally certified to teach and the aide is not, and a certain amount of care must be observed in role definition if the proper relationship is to be achieved.

Finally, it perhaps needs to be added that while the teacher's role in a differentiated facility is not as simple as her classic role, it is nonetheless central and vital. In fact, properly utilized, the principle of differentiation will

enhance the influence of an experienced teacher by making her skills more widely available.

The use of aides has arisen because of the failure of the group lecture technique to reach problem learners. Such students can be helped through individual learning prescriptions. It takes a team approach to implement this, however. In particular, such students require individual attention of a tutorial nature, and only the aide has the time for such activity.

In this division of labor, the first team member selects the medicine and the second provides the spoonful of sugar that makes the medicine go down. In short, a certified staff member selects materials and techniques, and an instructional assistant administers them.

As the paraprofessional team member becomes more effective in assisting with classroom activities, the teacher becomes freer to concentrate on other things. In particular, the teacher can give more attention to such things as planning; diagnosis and prescription for individuals; and evaluation of the educational environment and experiences.

This approach to instruction provides better use of the expertise of the more highly trained teachers than has been possible in the classic self-contained classroom containing one teacher and thirty pupils. Not only does the individual get more attention in this environment, the converse is also true; namely, the skilled teacher can be spread over more students. The use of aides has a multiplier effect on the efforts of the teacher.

This characteristic introduces the element of cost effectiveness, especially in the Multiunit School. Where differentiated staffing is available, it is wasteful to utilize professional staff for activities falling within the competence of instructional assistants. School budget pressures will therefore exert their discipline toward limiting the duties of teachers to strictly professional activities.

In her enhanced role as diagnostician, the teacher will need to develop skills in administering and interpreting diagnostic instruments of a formal and informal nature. She will find that her observational skills will improve. The diagnostic reports will put her in a better position to select proper learner activities, and to prescribe individual instruction. The winner in all of this is the pupil, of course, who stands a better chance to achieve the objectives selected for him.

The role of facilitator of instruction presupposes a level of professional ability that goes beyond that of diagnostician.

The facilitator will need to be a master teacher trained to initiate plans, and to select and program instructional methods, techniques, and materials, accordingly as they are responsive to particular needs.

Where an aide is present, the traditional self-contained classroom is immediately redefined. The role of the teacher becomes that of supervisor of supportive staff.

Most teachers have always taken complete responsibility for the classroom. They are not familiar, through experience or training, with assuming a managerial capacity when an assistant becomes a member of the team, and it is difficult for them to delegate responsibility to such an assistant.

Nevertheless the teacher, as a manager, will need to evaluate the performance of aides as well as of pupils. She will need to supervise the paraprofessional's reports of the individual child's progress through conferences. This will permit integration to occur between the independent tutorial work and the continuing classroom program.

It perhaps bears mentioning that the teacher's role is defined by law and that of the aide is not. Only the teacher is legally certified to conduct and supervise teaching activities. That being the case, the work of the assistant must, of necessity, be carried on under the supervision of the teacher. The diagnosis of educational needs and the selection of educational programs and procedures to meet those needs remain the prerogative of the professional educator.

In the new dimension of instruction-related activities, the classroom teacher must step up to a higher level of responsibility with respect to diagnosing, prescribing and evaluating. This enhances her self-esteem as one who is able to organize human and material resources in meeting educational needs.

The teacher's role becomes that of "orchestrator of resources." This places new emphasis on qualities of leadership and management. Already accountable for learning, the classroom teacher becomes, through new emphasis on diagnosis and prescription for learning needs, accountable, as well, for the learning environment.

Such teachers should not consider that they will be spending less time teaching. They should consider that they will be spending more time in professional responsibilities such as planning and evaluating instructional programs, guiding and counseling pupils, and diagnosing pupil needs.

These activities will lead to a new awareness of the teacher's professional status. She will be doubly rewarded by these activities. On the one hand, there is the reward of holding down a more responsible position. On the other, there are the fruits of direct contact with her pupils which remain the most gratifying compensation available to the professional educator.

II

CARRYING OUT THE TRAINING PROGRAM

1944-1945

4. GAINING PUBLIC ACCEPTANCE

It is important to remember that projects such as the introduction of teacher's aides into a public school system are not done in a vacuum. The acceptance of the program in a given instance will be due in large measure, not to the basic need for it, but to how well the groundwork has been laid, and how much attention has been paid to this facet as the program develops.

The experience of the Merrimack Education Center is a case in point. The introduction of teacher's aides was preceded by several years' familiarity with the Center itself. It was also preceded by a systematic program of needs assessment. The participating schools themselves were instrumental in pointing out the need to do something about students with learning disabilities. And the teachers in the schools were trained by the Center to cope with students having such difficulties. Most of these things had taken place before the aide training program was introduced.

The first annual needs assessment study, conducted by the Center in local schools, was administered in the Fall of 1970. Eighty-five per cent of the teachers and administrators filled out a questionnaire based on current "buzz words" to identify their critical needs by school building and town. The needs assessment data indicated a great need for information in the area of learning disabilities. Data from the updated needs assessment for 1971-72 was used in offering an in-service program in learning disabilities, a mini-course for local teachers.

The scope of the mini-course included assisting teachers in considering the conditions under which success is possible for children with problems in learning; alerting teachers to the necessity of providing individualized instruction for students with learning difficulties; and demonstrating, through the structure of the mini-course itself, the model for building individualized learning programs. Thus the teachers who participated were thoroughly prepared in the psychological sense for the later deployment of paraprofessionals in their classrooms.

A number of devices were used by the Center during the aide training program to keep the fields of acceptance green. Recruitment of trainees was conducted by means of articles published in local newspapers. These articles served the secondary purpose of informing area residents, teachers included, that such a program was under way.

Letters were sent to the Center's Advisory Board and to cooperating superintendents (those furnishing classrooms for practicum experiences). These letters explained the nature of the program and the reasons for it, and solicited acceptance of it. Librarians in the region were sent a letter requesting cooperation in making resource materials available. The trainees themselves were sent orientation letters upon their acceptance into the program, and were given Certificates of Achievement upon the completion of their training.

Examples of these various documents have been included in Appendix II. The use of these or similar devices should be considered a prerequisite for a successful training program for paraprofessionals.

5. RECRUITING AND SELECTING

Experience shows that a simple news release sent to community newspapers and local school newsletters is sufficient to attract candidates for training in the desired numbers. The sample news release included in the appendix illustrates the desired format. The release should announce the program and invite interested persons to apply for training. The program should be identified as to its salient features, for instances, that the purpose is to train teacher assistants to work with educationally-handicapped children; that those accepted will be trained and given a certificate, and that they will then be assisted in finding placement opportunities in the local school system where they can use their newly-acquired skills.

As a measure of the response to expect, the experience of the Merrimack Education Center may be taken as an example. The Center is a collaborative of 20 contiguous communities in north-eastern Massachusetts comprising 5,000 teachers and 100,000 students. The area is a mixture of rural, suburban, and urban communities, but it does not include Boston nor its immediate suburbs. In this community, 90 candidates responded to a single news release by submitting applications for training.

From the 90 candidates, 44 were selected by the Center to undergo training. Forty of these finished the course, the others dropping out for reasons such as lack of transportation and family illness. Those taking the training were given a stipend of \$150.00, and this is believed to have contributed to the high completion rate. Of the 40 who finished the course, 27 were subsequently placed as paraprofessionals in the public school systems in the area which the Center serves.

The success of the program requires that the process by which candidates are selected operate to produce individuals likely to be effective in the context of the program. Selection of individuals in such a program operates at three levels. (1) The candidates self-select themselves by the nature of the program; (2) the training center makes a selection from those applying; and (3) the schools select from those whom the training center has prepared. An additional health requirement may be imposed by state departments of education; in Massachusetts, the paraprofessionals are required to submit a certificate of health indicating the absence of communicable tuberculosis.

Traditional measures of selection will probably be employed by the principals who do the actual hiring of the assistants. These include such measures as evaluation of the assistant's ex-

perience, personal recommendations, and interviews conducted at the local building level.

This leaves the training center with the opportunity to exercise a type of selection that is specific to the needs of the program. We suggest as criteria the possession of certain warm, human qualities; specific interest relating to the program; motivation and commitment; and willingness to operate as a team member.

With respect to human qualities, the candidate should be one who exhibits a spontaneous empathy to the child with learning difficulty. She should have the qualities of sensitivity, warmth, empathy, encouragement, and concern, and she should have a spontaneous ability to relate to people, especially children.

With respect to specific interests, the candidate should be interested in the education process in general and in learning difficulties in particular. There should be a basic psychological acceptance of the child with a learning difficulty and a genuine concern to help him in his situation.

The motivation and commitment of candidates can be judged from their records. In the Merrimack Education Center project, we found that all participants would be considered "civic-minded" by virtue of past participation in some type of volunteer activity. Some had had experience in working with children as scout leaders or Sunday School teachers. Some has served local schools as volunteer or paid aides in supervising cafeterias, libraries and playgrounds. We also found that the aides indicated on questioning that a large part of their personal motivation for engaging in such a program came from commitment to community in general and the school community specifically. This motivation increased during training, and awakened in many trainees a desire for professional advancement within the educational community. As has already been indicated, we reinforced the commitment of candidates by "putting our money where our mouth is," to wit, we paid each person who completed the training a stipend.

Judging the individual's potential as a collaborator in the teaching/learning process is a somewhat sensitive area. In plain words, it is necessary for the paraprofessional to subordinate herself at all times to the teacher whom she is assisting. An individual who is unable to do this or uneasy about it certainly suffers nothing with respect to her general character, but at the same time she is not a good candidate for a job as a teacher's aide. The system should unobtrusively de-select such persons before they become misfits and possibly damage the

reputation of the overall effort. At the same time, the program should spell out in some detail the relation between aide and teacher in order to avoid uneasiness on the part of either. Suggestions as to how this may be done are given in other parts of this manual.

6. DESCRIPTION OF THE POPULATION

The experience of the Merrimack Education Center is probably a valid indication of the type of person any such program is likely to attract. The Center's group of trainees ranged in age from 22 to 61 years, and included young women, mothers with grown children, and widows. None was dependent on Center activities for living expenses. The stipend they received was considered remuneration for expenses incurred in traveling to schools, for the purchase of inexpensive texts, and for expenses arising from the fact that they were away from home on Center activities from ten to twelve hours per week.

All trainees possessed a high school diploma, and several had at one time evidenced the desire to pursue a career in education. Thirty had college or business school in their backgrounds, and nine had completed four years of college.

Seven of those accepted into the program reported having a child who experienced difficulty in academic achievement in school at some time or other. These mothers had a particularly strong desire to be involved in a program which would benefit non-learning children.

It should be noted that all of the participants came to the program with great enthusiasm and quickly developed a dedication both to the Center group and to the children in the schools where they obtained their practicum experiences.

These data are summarized in Tables 2 and 3.

TABLE 2PREVIOUS OCCUPATIONS

Clerical.....	3
Secretarial.....	5
Teacher Aide (Supervisory).....	13
Tutor and Substitute.....	7
Unemployed.....	9
Medical Technologist.....	1
Stewardess.....	1
Recreational Instructor.....	1
Volunteer in Service Project.....	19*

*Some checked more than one category

TABLE 3EDUCATIONAL BACKGROUND

No High School Diploma.....	0
High School Diploma.....	13
Some College Credits.....	8
Two years of College.....	11
College Degree (4 years).....	7

7. THE TRAINING PROGRAM

Paraprofessionals can be adequately trained in 10 weeks. At the end of this time they will be prepared to provide meaningful and productive help to regular classroom teachers in assisting students with learning disabilities.

The arrangements are perhaps a matter of taste as to detail, but a program of 50 hours of formal instruction plus 50 to 60 hours of classroom experience working with children under a teacher's supervision is suggested. The instruction may be given in two-hour sessions; the Merrimack pilot project used 25 such sessions in two five-week periods, the first period with three afternoon sessions a week, the second period with two such sessions. Classroom practicum experience can run concurrently, and should be used for applying the principles and instructional materials that arise from the formal segment periods. The Merrimack project involved in excess of 200 children identified as having learning disabilities, who were assisted individually or were seen in groups of no more than six.

The classes for the paraprofessionals may include lectures, discussion seminar groups, workshops, and participative meetings.

The content suggested for the formal instruction is given in the course outline, "Methods for Learning Disorders and Field Practicum," which follows. A substantial background in learning disabilities is in order. Psychology, child growth and development, motivation, observation and participation related to visual-motor perceptual development, auditory perception and language development, social and emotional adjustment, all are in order. The paraprofessionals will be working with underachieving children and youths who have experienced frustrations attendant on failure at learning; considerable emphasis can, therefore, be placed on helping them understand how and why pupils fail, and why pupils fail, and what can be done about it.

In addition, the trainees should be given sufficient orientation to enable them to perform effectively in their new environment. The role of paraprofessional is not well-defined, and considerable self-image development is in order. Lectures on the paraprofessional's role in the learning team should be given, as well as a lecture on the expectations and limitations of paraprofessionals.

The trainees should also be sufficiently grounded in educational ethics, and should be shown the ropes with respect to the so-called "survival" skills; that is, the procedures and customs that grease the administrative machinery of the school system.

The trainees can profitably be given special instruction in the methods of recording pupil behaviors. This prepares them for the field work practicum; an adequate grounding in this technique will be sufficient to enable them to identify and define problem behaviors.

The trainees should be required to employ formal lesson plans in their practicum work. (see Table 4.) These plans will have an added value as a source of information for the school administration. The trainees should also learn to develop their own instructional materials that are responsive to the particular needs of the children with whom they are dealing. The Merrimack experience was that this effort addresses directly the student's need for individualized instruction. Workshop sessions in which the trainees present their own instructional materials tailored for this or that student will tend to be richly interactive between the trainees and the instructors. This method will also foster the dedication to the project that was an important part of the Merrimack experience.

A case study showing the successful application of such instructional materials is given in the appendix.

TABLE 4.

LESSON PLAN

NAME: _____ TIME: _____

TOPIC: _____ LEVEL: _____

Diagnosis	Objectives	Content (Materials)	Method	Evaluation

8. COURSE OUTLINE

The following outline sketches in the suggested course content for "methods for Learning Disorders and Field Practicum."

- I. Role of the paraprofessional.
 - A. The paraprofessional's role in the learning team.
 - B. Responsibilities as a member of the school team.
 - C. Expectations and limitations of paraprofessionals.

- II. Exploring human interactions.
 - A. Relationship with classroom teachers.
 - B. Establishing rapport with students.

- III. Introduction and orientation to the field of learning disabilities. An overview of the definitions of learning disabilities and the nature of learning disabilities.

- IV. What is a learning disability?
 - A. Learning styles and learning disorders.
 - B. Why some people have difficulty learning, and what we can do about it.
 - C. Why pupils fail in communication skills:
 1. social and emotional factors
 2. intellectual
 3. physical
 4. educational

- V. Nature of the learning process.
 - A. definitions
 - B. language communication as basic to education
 - C. reading as a communication skill
 - D. Recall and reproduction
 - E. Formulation
 - F. Areas of learning deficit
 1. Five Symbol
 - a) Receptive Language
 - b) Expressive Language
 - c) Reading (visual receptive)
 - d) Writing (Visual expressive)

8. COURSE OUTLINE (continued)

- 1) Handwriting
- 2) Spelling
- 3) English composition

e) Mathematics

2. Non-verbal skills
3. Serial Order Skills

- a. Alphabet
- b. Ordinal and cardinal numbers
- c. Days of the week
- d. Months and seasons of the year

D. Development of Psychomotor Skills

1. Gross motor skills.
2. Fine motor skills.

VI. Dynamics of child development.

- A. Child Development guidelines.
- B. Special guidelines for Special Education.

VII. Characteristics of children with Learning Disabilities.

- A. Understanding emotional, social and physical capabilities.
- B. What are the needs of the learning disabled?
- C. How do we determine these needs?
- D. Problems of children who com for tutorial instruction.
- E. Guidelines for working with children who are handicapped in learning.

VIII. Organizing and planning for effective tutorial instruction.

- A. Modifying the environment for success.
- B. Prescriptive teaching and remedial diagnosis.
- C. Observations of child behaviors.
- D. Methods of anecdotal record keeping.
- E. Classroom organization:
 1. principles of grouping
 2. types of groupings
 3. individualized instruction

8. COURSE OUTLINE (continued)

IX. What you need to know about language development.

- A. Relation to self-concept and ego development.
- B. Motivating language development.
- C. Developing cognitive skills.
- D. Sequence for the acquisition of skills.
- E. Methods for learning disorders in reading.

- 1. fundamentals of reading
- 2. word recognition skills
- 3. basic comprehension skills
- 4. story-telling technique

X. Curricular materials for the tutorial program.

- A. Materials, techniques and devices useful in working with pupils with learning disabilities.
- B. Use of games, workbooks, basals.
- C. Audiovisual materials.
- D. Encouraging recreational reading.

XI. Activities and Techniques appropriate for children with learning disabilities.

A. Visual motor

- 1. Perceptual constancy
- 2. Figure ground
- 3. Position in space
- 4. Visual memory
- 5. Spatial relationships
- 6. Visual discrimination
- 7. Visual sequencing

B. Auditory awareness

- 1. Auditory recognition
- 2. Auditory identification
- 3. Auditory discrimination
- 4. Auditory recall
- 5. Generalization
- 6. Comprehension
- 7. Imitation

A P P E N D I C E S

SUGGESTED PRE-SERVICE WORKSHOP TO FACILITATE
UTILIZATION OF INSTRUCTIONAL ASSISTANTS

This outline provides for approximately eight hours of pre-service. It includes types of sessions, materials, activities, and references. The outline is divided into the following four major topics:

- 1) Orientation to Schools and Education
- 2) How Volunteers work with Teachers and Pupils
- 3) Aspects of Curriculum and Instruction
- 4) Developing and Utilizing Instructional/
Learning Resources

1. Orientation to Schools and Education
2. How Volunteers work with Teachers and Pupils

OUTLINE	ACTIVITIES	MATERIALS
<p>Expectations of volunteers; Provide volunteers with background information on schools. Understanding structure and organization of contemporary school systems; goals and objectives of local school system as they relate to basic needs of children and society.</p> <p>Historical basis for present practices. Professional ethics and ethical behavior for school-related personnel.</p>	<p>Greetings from Principal Instructor explains design for workshop.</p> <p>View videotape-brief discussion. Roles of volunteers and other auxiliaries.</p> <p>Needs assessment; self-assessment in terms of the role; areas of needed improvement in competencies.</p>	<p>Videotape</p> <p>Guidelines for Volunteers (including glossary; procedures to be followed)</p>
<p>Define Roles Principal Teacher Paraprofessionals</p>	<p>Develop written guidelines as to roles and responsibilities of the volunteer. Guidelines for workshop and eventual utilization of volunteers.</p>	<p>"Guidelines for Volunteers"</p>
<p>Need for Training</p> <p>Bases for present practices in utilizing volunteer and other paraprofessionals.</p>	<p>Discuss and record</p> <ol style="list-style-type: none"> 1. duties of aides 2. relationships with pupils & teachers 3. part volunteers play in educational system 	<p>ED 044 549</p>
<p>Interacting with other adults; teachers, principal.</p>		

OUTLINE	ACTIVITIES	MATERIALS
Four smaller units (divide volunteers in- to four groups)	Volunteers partici- pate in each of four activities.	Four instruction- al areas and packets set up in library.
a. clerical section (record-keeping and forms.)	Volunteers demon- strate proficiency with audio-visual equipment and other types of "hardware."	
b. curriculum guides		
c. resource materials for learning		
d. ideas for construct- ing and creating in- structional materials		
Dynamics of learning and grouping modes.	Discussion: basic needs of children as they effect their personal behavior; adjustment and de- fensive mechanisms employed when they fail to learn to satisfy needs.	Havighurst Needs hierarchy
Structured observation and Classroom partici- pation		
Volunteers observe and participate and record in classrooms to which they will be assigned.		ED 044 549
Observing areas of human growth and development; performance and obser- vation; describing the educative process (physi- cal, emotional, social, and intelectual.)		

OUTLINE	ACTIVITIES	MATERIALS
<p>Objectives for learners in reading, math spelling, etc.</p> <p>"learning to learn"</p>	<p>Directions for care of equipment.</p>	<p>Filmstrip - Building the Learning Pro- gram</p> <p>ED 044 549</p>
<p>Resources utilization of audio- visual equipment in classrooms; Instruction- al Materials Centers; Library and research work; how we prepare, select, organize in- structional materials.</p>		
<p>Using correct form in cursive and manuscript printing and writing.</p>		

APPENDICES

I.	<u>Workshop Outline</u>	28
II.	<u>Gaining Public Acceptance</u>	33
	A. News Releases	
	1. News Release Announcing Program.....	34
	2. Individual News Releases for Trainees.....	35
	3. News Clippings from MEC Classes.....	37
	B. Material Directed to Trainees	
	1. Application.....	41
	2. Letter to Accepted Trainees.....	42
	3. Achievement Certificate.....	43A
	C. Letters to Cooperating Officials	
	1. Letter to Advisory Board.....	44
	2. Letter to Cooperating Superintendents.....	45
	3. Letter to Region Librarians.....	46
III.	<u>Materials for Trainees</u>	47
	A. The Unit and Its People--Paraprofessionals.....	48
	B. Some Guidelines for the Paraprofessional.....	50
	C. Survey of Several Types of Assessment.....	52
	D. Lesson Plan.....	54
	E. Directed Classroom Observation.....	55
IV.	<u>Bibliographies and Glossaries</u>	56
	A. Learning Disabilities Bibliography.....	57
	B. ERIC Documents on Paraprofessionals in Education.....	62

C.	A Glossary of Basic Educational Terms.....	66
D.	Learning Disabilities Glossary.....	68
E.	Information Sources for Parents (See also "A Selective Bibliography of ERIC Documents pertaining to Learning Disabilities" in Appendix VI.D.).....	74
V.	<u>Evaluation Questionnaires</u>	76
A.	Evaluation Questionnaire for Trainees (To be completed after completion of Training).....	77
B.	Opinionnaire. (Used to help define classroom duties of Paraprofessional).....	83
VI.	<u>Training Experience of the Merrimack Education Center</u>	86
A.	Map of MEC Region.....	87
B.	"Timmy -- A Case Study".....	88

APPENDIX II

GAINING PUBLIC ACCEPTANCE

A. News Releases

APPENDIX II.A.1.FIRST NEWS RELEASE (Sample)

The following news releases can be used for local newspapers or for release through school newsletters.

Dr. Richard J. Lavin of the Merrimack Education Center in Chelmsford is pleased to announce that a program for training classroom tutors will be put into operation within the next few weeks.

One of the major concerns of the Merrimack Valley schools is the development of resources for serving the 15% of the school population in need of individualized help for specific learning disabilities. It has been noted around the country that one way to meet these individual pupil needs is through the use of paraprofessionals. The Center recognizes the need for the development of training programs to provide adequately-trained paraprofessionals for the local school classrooms.

MEC is a Title III, ESEA regional center serving 20 school districts and 100,000 children. As a regional center serving the communities of the Merrimack Valley, MEC will be interviewing and training classroom tutors for work with individual and small groups in cases where the local school faculty has identified a learning disability.

The proposed tutor training program will provide pre-service and in-service training of paraprofessional staff for working in programs for the educationally handicapped child. After completion of the training program, the paraprofessionals will receive a certificate of training from the Center and will be given assistance in placement opportunities within the Merrimack Valley. Interested parties are invited to contact the Center for applications and a personal interview.

Coordinating the training program for the Merrimack Education Center is Jean E. Sanders, Coordinator of Special Education.

* * *

APPENDIX II.A.2.

Ms. J. Jones is among forty women enrolled in a course in special education to prepare to work with children who have learning handicaps.

The program is being conducted under the auspices of the Merrimack Education Center, Chelmsford, and will prepare teaching assistants for schools in the Merrimack Valley region.

The assistants are receiving 120 hours of training, including 70 hours of classroom experience under the direction of a certified teacher.

The program is under the direction of Ms. Jean E. Sanders Coordinator of Special Education at the Merrimack Education Center. Financing of this phase of the Center's activity is through federal funds under Title III of the Elementary and Secondary Education Act.

The purpose of the training program is to orient non-professional personnel to the requirements of an effective individual tutorial program under the supervision of a qualified teacher in learning disabilities. The paraprofessionals, who vary widely in their personal experiences, were selected on the basis of their concern for children and their potential as collaborators in the learning-teaching process.

The trainees receive orientation in developmental skills, learning disabilities, instructional media, and in the treatment of learning problems. An essential part of the ten-week intensive course, the field work, takes place within the structure of the local school classroom. The instruction by the tutorial assistants, then, is an outgrowth of the classroom situation and the individualized program established and designed by the certified teacher.

The Merrimack Education Center has designed this training program to assist local schools currently meeting needs of the school population evidencing learning disabilities. Heightened awareness of individual learning needs, as well as rapid changes and new dimensions taking place in education, have highlighted the need for adult assistance in the local schools. This type of paraprofessional training program provides adult assistance for the teacher in order to facilitate instructional programs. The pupil benefits from the specialized instruction and additional individual attention. Benefits for the teachers as well as for the assistants have also been noted throughout the program.

APPENDIX II.A.2. (continued)

Trainees in the Merrimack Education Center program, under the leadership of Mrs. Linda Zalk of Malden, prepared some of their own materials and media for instruction. All of the assistants have demonstrated concern for children and willingness to be directed by a certified teacher. They have expressed a sense of satisfaction and reward in working with educators in the local school systems. The teaching assistants have devoted six hours per week assisting the teacher in working with children who would profit from individual attention, as well as spending six hours each week in training sessions with Mrs. Zalk and an equal amount of time, on their own initiative, reading, studying, and preparing for their class sessions.

* * *

APPENDIX II.A.3.

Examples of publicity following the use of the news releases just shown

TUTOR TRAINING

"The Merrimack Education Center, (MEC), 101 Mill Road in Chelmsford, is offering a training program for classroom tutors, according to Director Richard J. Lavin.

MEC is a regional center serving 20 school districts in the Merrimack Valley. The center will interview and train the tutors for work with individuals and small groups where the school faculties have identified a learning disability.

"The Proposed training program will provide pre-service and in-service training of paraprofessional staff for working in programs for the educationally handicapped child.

After completion of the program, those taking part in the program will receive certificates and will be given assistance in placement opportunities in the Merrimack Valley.

Interested people may contact the Center for applications."

31 AREA WOMEN TRAIN AS INSTRUCTIONAL AIDES

"CHELMSFORD -- Thirty-one women, all local community residents, are participating in a training course for instructional assistants offered by the Merrimack Education Center. The 32 women are all involved in local schools in various capacities, either as teaching aides, as educational secretaries, as clerical aides and the like.

The women, most of them mothers of school-aged children, are interested in helping the teachers in the buildings where they are presently employed to individualize instruction and meet the needs of all children.

More recognition of both children and aides is at the heart of the training program. Through studying various topics such as child growth and development, how children learn

APPENDIX II.A.3. (continued)

and what factors cause pupils to have difficulty learning, the aides are more able to help the teachers in performing various tasks related to instruction.

The aides will be participating in workshop sessions, where they will become familiar with audiovisual equipment, and will learn to make manipulative devices and instructional materials that will assist in the teaching-learning experiences in school classrooms.

The Merrimack Education Center also offers programs for teachers and other groups. A program will be offered in January for community residents who are not employed in schools but who are interested in learning more about education and instruction.

These programs are open to persons who are interested in eventual employment as teacher aides. The training program beginning the first of the year is primarily for persons not presently assisting in schools who may be considering applying for teacher aide positions in the future.

Coordinating the training program for MEC is Jean E. Sanders; the instructor for the training programs is Linda Zalk of Malden. Mrs. Zalk also taught the paraprofessional training program last year for MEC. She worked last summer in cooperation with Fitchburg State College training teachers to work with children having learning disabilities.

One of the prime concerns of the Merrimack Valley Schools, highlighted on the annual needs assessment conducted by MEC, is the development of resources implementing individualized instruction. It has been noted nationally that one way to help meet these individual pupil needs is through the use of differentiated staffing models employing instructional assistants and other auxiliaries. The Center has recognized the need for the development of training programs to provide approximately trained paraprofessionals for local school classrooms."

TRAINING PROGRAM OUTLINED

Dr. Richard J. Lavin of Leominster, director of the Merrimack Education Center, Chelmsford, today announced that the training program for instructional assistants will be offered

APPENDIX II.A.3. (continued)

beginning Thursday, Dec. 2.

MEC is a regional center serving school districts of Andover, Bedford, Billerica, Chelmsford, Lawrence, Dunstable-Groton, Littleton, Lunenburg, Methuen, North Andover, Reading, Tewksbury, Tyngsboro, Westford, Wilmington, Carlisle, Lawrence Regional Vocational-Tech., Greater Lowell Regional Vocational Tech., Nashoba Valley Technical High School, and Shawsheen Valley Vocational Tech.

The Center will interview and train teacher assistants for work with individuals and small groups where the school faculty has identified individual learning needs. This proposed training program will primarily provide in-service training of paraprofessional staff already working in MEC community schools.

New Class

A second training program will be offered beginning the first of the year for persons not presently assisting in schools who may be considering applying for teacher aide positions in the future.

After completion of the training program, the paraprofessionals receive a certificate of training from the center and will be given assistance in placement opportunities within the Merrimack Valley. Interested parties are invited to contact the Center for applications and a personal interview.

Co-ordinating the training program for MEC is Jean E. Sanders; the instructor for the training program is Linda Zalk of Malden. Mrs. Zalk also taught the paraprofessional training program last year for MEC. She worked last summer in cooperation with Fitchburg State College training teachers to work with children having learning disabilities.

One of the prime concerns of the Merrimack Valley schools is the development of resources implementing individualized instruction. It has been noted nationally that one way to meet these individual pupil needs is through the use of differentiated staffing models employing instructional assistants and other auxiliaries. The center has recognized the need for the development of training programs to provide appropriately-trained paraprofessionals for the local school classrooms.

* * *

APPENDIX II

GAINING PUBLIC ACCEPTANCE

B. Material Directed to Trainees

APPENDIX II.B.3.APPLICATION FOR
INSTRUCTIONAL ASSISTANT TRAINING PROGRAM

NAME _____ PHONE _____

ADDRESS _____

EDUCATION:

HIGH SCHOOL _____
COLLEGE _____ DEGREE _____

Are you presently employed? _____

Title of present position _____

Have you held a leadership position? _____

Why are you interested in working with children? _____

Have you ever worked with a handicapped child? _____

Have you ever worked with children in any of the following:

___ volunteer	___ tutorial	___ library	___ phys. ed.
___ health	___ scouting	___ church group	___ or sports

Was this program affiliated with a school system? Yes ___ No ___

Were you required to attend a training program before and/or during this position? Yes ___ No ___

Would you be interested in working with children ages 4-12 as a tutor? _____ Ages 10-15? _____

Which of the following time blocks would be most convenient for you?

Morning session ___	afternoon session ___	full day ___
5 days a week ___	3 days a week ___	1-2 days/wk. ___

Could you devote 10-12 hours per week to tutoring in a school? _____

How far from your home are you willing to travel?

- a. for training sessions _____
- b. for employment _____

Who referred you to the Center's program? _____

APPENDIX II.B.2.

January 1971

To all trainees:

We will be meeting for our first orientation session on Monday, January 18th, at 1:00 p.m. The enclosed map will help direct you to the North Intermediate School in Wilmington. Parking for cars is on the right hand side of the building as you face the front door. There is a direct entrance from the parking lot to a wing of the building where you will find the cafeteria, our assigned place for meeting.

From then on, we will be meeting in Wilmington on the following days from 1:00 p.m. to 3:00 p.m.:

Monday, Wednesday, and Thursday.

After five weeks, the days will be Monday and Wednesday. Incidentally, the week of February 15th is school vacation week, and we will not have the scheduled sessions in Wilmington.

In addition to myself, you will be meeting other persons who will assist in the training, including cooperating teachers who will visit you during the assigned hours of field work in the local schools. I am presently finishing up arrangements for you to all be placed in a locale as near to your home community as possible.

I am planning one seminar session near the beginning of our training program that will be held during the evening. This is in order that we can all get together with the teachers from the various towns where you will be doing your field work practicum. This evening meeting was planned so that teachers from public schools would not have to be dismissed from their classroom assignments in order to meet with us. At this session, we will discuss mutual concerns regarding the role of paraprofessionals in the Merrimack Valley schools.

A legal requirement for all personnel involved in any way with schools in Massachusetts is a tuberculin test. Either a chest x-ray or a skin test will suffice. You could meet this requirement by going to the Lowell Clinic where the service is free. Be sure to request that a copy of the report be sent to me at the Center, or please bring me the report when you receive it in the mail. I must have this form on file to meet the state requirements.

APPENDIX II.B.2. (continued)

If you have any questions between now and next Monday, feel free to call me at any time. One of the necessities for a successful program such as this is that communications be direct and open.

I will let you know of your assignments for field work practicum as early in the week as possible so that you can make arrangements to meet the local teacher at the school where you will be placed.

Sincerely,

/S/ Jean E. Sanders
Coordinator
Special Education

JES/lb

APPENDIX II.B.3.

Achievement Certificate

Merrimack Education Center



Achievement Certificate

This is to Certify that

Has Successfully Completed

CHAIRMAN, EXECUTIVE BOARD

EXECUTIVE DIRECTOR

DATE: _____

APPENDIX II.C.1.Letter to Advisory Board

January, 1971

MEC has recently developed a program to train paraprofessionals in the specialty of Learning Disabilities.

You are invited to attend a meeting at MEC on Friday, January 22nd at 1:30 p.m. to discuss aspects relevant to the role of paraprofessionals in Merrimack Valley schools, in the Learning Disabilities program.

We will discuss such questions as the following:

- 1) Delineate specific activities in which paraprofessionals should and should not be engaged.
- 2) Discuss specific reservations concerning the use of aides.
- 3) To state desirable and undesirable qualities of paraprofessionals.

The suggestions made at this particular get-together will be considered in the training program so that paraprofessionals will be trained to fulfill the expectations of the local teachers and specialists.

At this time you will be able to bring up other items of concern to you in regards to the training of paraprofessionals.

Sincerely,

/S/ Jean E. Sanders
Coordinator
Special Education

JES/lb

APPENDIX II.C.2.Letter to all Cooperating SUPERINTENDENTS

December 8, 1970

MEC has developed a program to train paraprofessionals in the specialty of Learning Disabilities. During the next few weeks, MEC will be recruiting and selecting forty persons who wish to become teaching assistants in the field of Learning Disabilities.

The program will appeal to certified teachers who are considering returning to the classroom and need to improve their skills and other persons, while not certified, who wish to enter the teaching profession and plan to pursue a program leading towards certification. In either case, it is important to have well-trained professionals and paraprofessionals to work with children with learning disorders. The training program is approximately 112 hours and includes daily seminars with skilled professionals. An integral part of the training will be the actual involvement of the trainee with pupils.

I am planning to contact, within the next few days, the person in your school system who works most closely with the Learning Disabilities Program. I would like to explore with this person the possibility of including your community in the program.

If you have questions about the program, I would be most happy to try and answer them. Thank you for your continued cooperation.

Sincerely,

/S/ Jean E. Sanders
Coordinator
Special Education

JES/lb

APPENDIX II.C.3.Letter to all Librarians

January 20, 1971

Dear Librarian:

The Merrimack Education Center (Title III-ESEA) is currently involved in pre-service and in-service training programs for teachers and tutors of children with learning disabilities. We also feel that there is a need for working with parents in this area.

The following bibliographise, list of print and non-print materials, would be helpful to teachers and parents in the Merrimack Valley. The Medford Public Library has recently received a federal grant to make some of these materials available to parents and they are considering hiring educational consultants who would be available to meet with parents at the Library and assist them with dealing with children who might have learning disabilities.

We have currently about 100 persons enrolled in various programs and there are teachers who have previously been enrolled in courses for inservice education. It would be of service to these people if you were able to have some of these materials available for their use as well as for parents who might be looking for help.

Thank you for your cooperation.

Sincerely,

/S/ Jean E. Sanders
Coordinator
Special Education

JES/lb
Enclosures

APPENDIX III.

Materials for Trainees

APPENDIX III.A.THE UNIT AND ITS PEOPLE - PARAPROFESSIONALS

In the Multiunit Elementary School, two classes of aides are utilized:

1. Instructional Aides - A paraprofessional member of the Unit staff who, working under the direct supervision of the teachers, performs various routine duties often involving pupils. These duties, depending on the experience and skills of the aide, may include administering and scoring tests, helping students find and work with instructional materials, supervising in large classrooms and resource centers, etc.
2. Clerical Aide - A paraprofessional member of the Unit whose duties are primarily secretarial.

Aides relieve certified professionals from routine, monitorial, and other clerical duties; assist teachers in the preparation of instructional materials; and assist teachers in organizing and maintaining the instructional setting.

Some of their responsibilities are:

1. The Instructional Aide
 - a. Assist preparation and mounting of bulletin boards and displays.
 - b. Assist in seatwork assigned by the teacher
 - c. Assist in setting up and operating equipment
 - d. Helping in story hours
 - e. Assisting in music, art, and physical education instruction by arranging equipment, assuring supplies are provided.
2. The Clerical Aide
 - a. Types master copies or stencils
 - b. Operates the copying or duplicating machine

- c. Keeps attendance records
- d. Collects milk money, or other special fund money
- e. Maintains files
- f. Picks up supplies

Increasingly, consideration is being given to the possibility that some paraprofessionals, especially those with bachelor's degrees, can be involved in some instruction of children. Some experimental programs have been conducted in which aides assist teachers by:

- a. Playing word games
- b. Reading to students
- c. Listening to students read
- d. Helping students find materials
- e. Supervising large groups of students in the library, lunch room, playground, bus-loading areas
- f. Helping slow students finish their work

APPENDIX III.B.SOME GUIDELINES FOR THE PARAPROFESSIONAL

1. Be punctual. If for some reason you are unable to be at the school at the appointed time, please call.
2. Adopt professional ethics as your own. All privileged and confidential information remains within the school. Never discuss confidential matters or privileged information outside of the school.
3. Commitment to the values of the school - the goals and objectives of the public school system is essential.
4. Cooperation with the professional staff of the school building is mandatory.
5. Be flexible. Often routines of the school have to be adjusted to meet a special situation.
6. Be compassionate and understanding: with students and with other adults.
7. Allow for individual differences. Keep an open mind. Remember that there are different personalities and different teaching styles. Above all, don't make value judgments.
8. Be tactful and respectful. Don't criticize the teacher.
9. Neatness and dependability are excellent qualities for an aide to develop.
10. Master the art of manuscript and cursive as adopted by your school system.
11. Be observant. Be perceptive and use good judgment. Allocate your time accordingly.
12. Confer with the teacher at regular intervals. Above all, ask when you don't understand the directions.
13. Use your own resourcefulness and creativity. The teacher will accept you as an intelligent person with much to offer.

APPENDIX III.B. (continued)

14. Maintain a healthful, helpful attitude. Your attitude of enthusiasm and cheerfulness will reflect in the people around you.
15. Be knowledgeable. Understand the task you are assigned. Master the terminology of the school room.
16. Develop excellent observational powers. Internalize the routines of the classroom.
17. Learn the "survival skills"; know your school. Be familiar with the building plan - the exits, the nurse's office, the safety hazards and precautions.
18. Treat pupils with respect. Neither blame, nor shame them. Maintain open communication channels with students and with other adults.

APPENDIX III.C.SURVEY OF SEVERAL TYPES OF ASSESSMENTPaper and pencil tests

very flexible;
 efficiency in scoring; can administer to large numbers
 simultaneously;
 many learning objectives cannot be translated to pencil
 and paper; some students perform badly or have fear
 of this kind of test.

Performance tests

state behavioral objectives clearly; define mastery
 level to distinguish masters from non-masters;
 resolves the difficulties inherent in paper and pencil
 tests;
 can be administered under identical conditions to dif-
 ferent pupils;
 time consuming.

Work samples

make judgments from samples of (usually written) work
 progress checks;
 determine minor areas of weakness or mastery;
 normal classroom situation:
 large numbers can be assessed relatively easily;
 disadvantage - tendency for pupils to be careless or
 sloppy.

Formal observation

state behavior to be observed;
 observe and record data;
 compare with other data;
 a formal "test" in a normal classroom situation can
 assess affective behavior;
 can detect learning styles, learning problems; student
 is unaware of his being assessed and thus nervousness
 is not a factor;
 can assess all students;
 somewhat time-consuming for large numbers of students.

APPENDIX III.C. (continued)Informal observation

keep open-eyed and open-minded;
observation is normally unscheduled and unplanned;
good teachers do it all the time;
varied -
quick and easy;
can assess affective data;
sometimes unreliable.

Self assessment

pupil knows his goals and compares his work against
a standard set by him or others;
flexible;
takes littler teacher time;
encourages responsibility;
fits into independent study;
can't always be sure of pupil's being candid (although
this is most likely due to pupil's reaction to pres-
sures of grading system)

Nonstructured conferences

one-to-one teacher-pupil or aide-pupil conference;
talk things over;
analyze difficulties or just get to know pupil;
open-ended;
can analyze learning problems;
human contact motivates pupils;
time consuming.

APPENDIX III.D.

LESSON PLAN

Name	Time	Topic	Level	Diagnosis	Objectives	Content (Materials)	Method	Evaluation

APPENDIX IV.

Bibliographies and Glossaries

APPENDIX IV.A.

LEARNING DISABILITIES BIBLIOGRAPHY

TEXTS

DOCUMENTS

MONOGRAPHS

Compiled by

Jean E. Sanders
Coordinator

January, 1972

Merrimack Education Center
101 Mill Road
Chelmsford, Massachusetts 01824

APPENDIX IV.A. (continued)

- Berry, K. Remedialdiagnosis. Dimensions Publications: San Rafael, California, 1968.
- Blatt, Sarason, and Davidson. The Preparation of Teachers. New York: John Wiley and Sons, Inc., 1962.
- Bortner, M. Evaluation and Education of Children with Brain Damage. Springfield, Ill.: C.C. Thomas, 1968.
- Botel, M. How to Teach Reading. Chicago: Follett Publishing Co., 1962.
- Buist, Charlotte. Toys and Games for Educationally Handicapped. Springfield, Ill.: C.C. Thomas, 1969.
- Byrne, R. Remedial Reading. Reading Newsreport Education, Inc., Washington, D.C., 1968.
- Calder, C. and Eleanor Antan. Techniques and Activities to Stimulate Verbal Learning. New York: MacMillan Co., 1960.
- The CELDIC Report. One million children. A national study of children in Canada with emotional and learning disorders. Published by Leonard Crainford for the Commission on Emotional and Learning Disorders in Children. 1970.
- Chalfant, J. and Margaret Scheffelin. Central Processing Dysfunctions in Children: A Review of Research. U.S. Department of Health, Education, and Welfare. Maryland: NINDBS Monograph #9, 1969.
- Cohen, Dorothy and V. Stern. Observing and Recording the Behavior of Young Children. Columbia University: Teachers College Press, 1968.
- Dorward, Barbara. Teaching Aids and Toys for Handicapped Children. Council for Exceptional Children, 1960.
- Ekstein, R. and R. Matto. From Learning for Love to Love of Learning. New York: Brunner-Mazel, 1969.
- Engel, Rose. Language Motivating Experiences for Young Children. Department of Exceptional Children: School of Education

APPENDIX IV.A. (continued)

- Flower and Lawson. (Eds.) Reading Disorders: A Multi-Disciplinary Symposium. Philadelphia: F.S. Davis, 1965.
- Frierson and Barbe. Educating Children with Learning Disabilities: Selected Readings. Appleton-Century-Crofts: New York, 1967.
- Gibson, Eleanor. The Ontogeny of Reading. *American Psychologist*, 25, 2, February, 1970.
- Giles and Bush. Aids to Psycholinguistic Teaching. Columbus, Ohio: Charles Merrill, 1968.
- Ginot, Haim. Between Parent and Child. New York: The MacMillan Company, 1965.
- Glasser, A. and Zimmerman. Clinical Interpretations of the WISC. Grune and Stratton, New York, 1967.
- Glasser, W. Schools without Failure. New York: Harper & Row, publishers, 1969.
- Golick, M. Parents Guide to Learning Problems. Quebec Association for Children with L.D., Box 22, Cote St., Luc Postal Station, Montreal 29, P.Q.
- Johnson, Doris. Educational Principles for Children with Learning Disabilities. Rehabilitation Literature. October, 1967, 28, 10.
- Havighurst. Developmental tasks and education. Second edition. New York: David McKay Company, Inc., 1952.
- Holsinger, Glenna. Behavior Modification Series: #1. A New Approach to Changing Behavior. Lexington, Mass.: Motivity, Inc., 1970.
- Johnson, Doris and H. Myklebust. Learning Disabilities: Educational Principles and Practices. New York: Grune and Stratton, 1967.
- Karnes, Merle. Helping Young Children Develop Language Skills. Council for Exceptional Children, Washington, D.C., 1968.

APPENDIX IV.A. (continued)

- Kolson and Kaluger. Reading and Learning Disabilities. Ohio: Charles Merrill Books, 1969.
- Lewis, R. Strauss and Laura Lehtinen. The Other Child. New York: Grune and Stratton, 1960.
- McCarthy, J. and McCarthy. Learning Disabilities. Boston: Allyn Bacon, 1969.
- Meeker, M. The Structure of Intellect: Its Interpretation and Uses. Charles Merrill: Ohio, 1969.
- Myers, Patricia and D. Hammill. Methods for Learning Disorders. New York: John Wiley & Sons, Inc., 1969.
- Myklebust, H. Learning Disorders: Psychoneurological Disturbances in Childhood. Rehabilitation Literature. December, 1964, 25, 12.
- Natchez, Gladys and Florence Roswell (Eds.) Children with Reading Problems. New York: Basic Books, 1969.
- Pines, Maya. Revolution in Learning. New York: Harper & Row, Publishers, 1966.
- Pope, Lilliee. Guidelines to Teaching Remedial Reading. Brooklyn, N.Y. Faculty Press, Inc., 1967.
- Reger, R. Special Education: Children with Learning Problems. New York: Oxford University Press, 1968.
- Russell, D. Listening Aids through the Grades. Teachers College Press, Columbia, 1966.
- Schiller, J. and Margaret Deignan. An Approach to Diagnosis and Remediation of Learning Disabilities. Journal of Learning Disabilities, 2, 10, October, 1969.
- Sharp, Evelyn. Thinking is Child's Play. New York, Dutton Publishing Co., 1969.
- Stauffer. Teaching Reading as a Thinking Process. Harper Row, 1969.
- Tarnopol, L. Learning Disabilities. C.C. Thomas, 1969.

APPENDIX IV.A. (continued)

Weinthal, Judy., and J. Rotberg. The Systematic Selection of Instructional Materials based on an inventory of Learning abilities and skills. Exceptional Children. 6, 8, April, 1970.

Wittes, Glorienne and Norma Badin. The Reinforcement Approach. Ypsilanti home and school handbooks. Dimensions, 1969.

Zigmond, Naomi and Regina Cicci. Auditory Learning. Dimensions Publications, California, 1968.

APPENDIX IV.B.

November, 1971

A SELECTIVE BIBLIOGRAPHY

of

ERIC Documents Pertaining to

PARAPROFESSIONALS IN EDUCATION

The Educational Resources Information Center (ERIC) is a National Information System operated by the United States Office of Education. ERIC serves the educational organization by disseminating educational research results and other resource information that can be used in developing more effective programs.

The Merrimack Education Center has over 50,000 of the documents from the ERIC Library available for the MEC region. Microfiche or hard copies of the complete documents cited in this bibliography are available through the local school system subscription with the information services of the Center.

This is the fourth bibliography in a series of documents on Paraprofessionals and Differentiated Staffing. For documents earlier in the series than ED 040 150, notify the Center to request the earlier bibliographies.

This bibliography is a product of the information services of the Merrimack Education Center.

APPENDIX IV.B. (continued)PARAPROFESSIONAL ASSISTANTS IN EDUCATION
Series 141-0971

- ED 052 142
A System Model of Differentiated Staffing
- ED 051 533
Selection of Paraprofessionals; Training of Paraprofessionals
- ED 050 910
Paraprofessionals - Their Role and Potential in the Classroom
- ED 050 850
Teacher's Aide Guide
- ED 049 184
Taxonomy of Paraprofessional Training
- ED 049 183
Paraprofessional Training Model. A process for Training
- ED 048 673
ERIC Documents on Differentiated Staffing
- ED 047 678
Occupations and Education in the 70's
- ED 045 587
Teacher Aide Training Program. Grand Forks, North Dakota
- ED 045 548
Training Paraprofessionals for Intensive Skill Building in
an Early Intervention Program
- ED 044 519
Nonprofessional Occupations in Education
- ED 044 374
The Impact of the Teacher and His Staff
- ED 044 365
Report of the NEA Task Force on Paraprofessionals
- ED 044 235
Teachers' Aides. A Project Report

APPENDIX IV.B. (continued)

- ED 043 811
The Teacher Aide. An Answer to the Teacher Shortage
- ED 043 595
Comparison of How First Grade Teachers With and Without Aides Utilize Instructional Time
- ED 043 581
Preparing School Personnel. Early Childhood Education.
- ED 043 578
Implementation of the Teacher and His Staff
- ED 043 574
Effect of Perceptual Conditioning Upon Decoding Ability of Elementary School Pupils Utilizing Trained Paraprofessionals
- ED 043 570
Do Teacher Aides Aid American Education?
- ED 043 463
Blueprint for a Successful Paraprofessional Tutorial Program
- ED 043 112
New Sets of Jobs for School Personnel
- ED 042 450
Paraprofessionals at Clearwater Campus
- ED 041 862
Volunteer Aides in Public Schools
- ED 041 722
Early Reading Assistance. A Tutorial Program
- ED 040 557
A Community Helper Program for Children with Behavioral Disorders
- ED 040 454
Paraprofessionals and Behavioral Objectives
- ED 040 160
Analysis of Demonstration Programs for Training Paraprofessionals in Education

APPENDIX IV.B. (continued)

ED 040 159

Utilization of Paraprofessionals in Education

ED 040 150

Behavior Modification Techniques and the Training of
Teacher Aides

APPENDIX IV.C.Glossary of Basic Educational Terms

Assessment: Act of obtaining information about the individual pupil regarding current achievement learning style and attitudes for the purpose of planning subsequent learning experiences. (Forms of assessment are paper and pencil tests, performance tests, observation, work samples.)

Basal: The basic text adopted by a school system. Basal reading series (i.e., Ginn, Houghton-Mifflin, Lippincott, etc.)

C.A.: Chronological age; given in year and months.

Clerical Aide: A paraprofessional member of the school system whose duties are primarily secretarial.

Cumulative record: Individual record-keeping format that proceeds with pupil through his school career. Also, a pupil profile card is a form of cumulative record that highlights the strengths and weaknesses of the individual pupil in a skill subject.

Curriculum guide: A guide for teachers in using the courses of study offered by their system. Presents a scope and sequence of skills.

Diagnostic test: Used to find specific strengths and weaknesses in a skill subject.

Differentiated staffing: Utilizing personnel with varied degrees of training and expertise to perform differentiated roles.

Educational objectives: A Statement of what behavior the pupil will demonstrate when he has completed a particular learning experience.

ERIC: Educational Resources Information Center: an information retrieval system comprising over 50,000 documents on "what's happening" nationally in education.

Grouping patterns: (1) independent mode (pupil working alone); (2) one-to-one (pupil working with another pupil, a teacher, aide or other adult); (3) small group (usually

APPENDIX IV.C. (continued)

4-11 pupils working together); (4) large group (35-40 or more pupils).

Learning Style: A combination of characteristics of the individual pupil that determines the way he learns best.

Individual Instruction: Designing and conducting learning programs with each student that are tailor-made to fit his learning needs. The instruction can include any of the grouping patterns (not just the one-to-one).

Instructional Assistant: A paraprofessional, working under the direct supervision of the teacher, who performs various duties involving pupils.

IQ: Intelligence Quotient. Schools use standard tests to measure students' general level of intelligence. An IQ score of 100 is considered average.

MEC: Merrimack Education Center. A cooperative of 20 communities established in 1968 with ESEA Title III funds provided for innovative educational centers.

Overhead projector: A projector which transmits a strong beam of light through a transparency (slide) and onto a screen.

Seatwork: Projects done by the pupil in his classroom seat.

School Plant: Land, structures and equipment constituting the physical facilities of a school.

Staff Development: Programs for improving effectiveness and skills of present staff as well as improving staff utilization (often incorporating differentiated staffing.)

Supplementary text: Used in addition to the basal series to provide reinforcement for skills as well as enrichment.

Transparency: Large plastic, carbon, cellophane, or acetate slides for use with an overhead projector.

Videotape: Camera equipment that can photograph on a reel of special tape and play back on a television set.

Workbook: A student's practice or exercise book.

APPENDIX IV.D.Learning Disabilities Glossary

Acalculia - Loss of ability to perform mathematical functions.

Acting out - Overt expression of strong feelings, nature of which is not always understood by the child.

Agression - A forceful action, usually directed toward another, often unprovoked, and out of proportion to the situation.

Agnosia - Inability to identify familiar objects through sensory impression; loss of ability to recognize and identify familiar objects through a particular sense organ, e.g. finger agnosia, auditory agnosia, color agnosia, picture agnosia, tactile agnosia, visual agnosia.

Agraphia - The inability to write resulting from brain injury or disease.

Alexia - Visual aphasia or word blindness; inability to read due to a central lesion or dysfunction of Central Nervous System. Loss of ability to receive, associate, and understand visual language symbols as referents to real objects and experiences.

Ambidexterity - The possession of manual skill in each hand, some acts being performed skillfully with one, some with the other.

Ambivalence - Coexistence of opposing emotions toward an object.

Anorexia - Lack or loss of appetite for food.

Anoxia - Deficiency or lack of oxygen. It may occur in the newborn in the transition from maternal supply of oxygenated cord blood to independent breathing. The brain cells are particularly vulnerable to continued anoxia, and this condition is frequently the cause of minimal brain dysfunction.

Antisocial - Behavior which is hostile to the well-being of society.

Anxiety - Feeling of apprehension, the source of which is frequently unrecognized.

APPENDIX IV.D. (continued)

Aphasia - Defect or loss of the power of expression by speech, writing, or signs, or of comprehending spoken or written language, due to injury or disease of the brain centers.

Apperception - Conscious perception and appreciation; the power of receiving, appreciating, and interpreting sensory impressions.

Apraxia - Loss of a previously-acquired ability to perform intricate skilled acts. Mild blindness; a condition in which there is a lack of a proper apprehension of the true nature of things leading to the performance of preposterous acts. Called also object blindness.

Asymmetry - Lack or absence of assymetry; dissimilarity in corresponding parts or organs on opposite sides of the body which are normal alike.

Ataxia - Marked incoordination in movement, resulting from brain dysfunctioning, marked by slow, recurring weaving movements of arms and legs, and by facial grimaces.

Babinski Sign - The extensor-plantar response, in which there is an extension (fanning) of the toes instead of flexion on stimulating the sole of the foot. It is an aid to neurological diagnosis.

Birth Trauma - The physical shock of birth.

Blend, Phonetic - Fusion of individual letter sounds into meaningful words.

Body Image - The picture or mental representation one has of one's own body at rest or in motion at any moment. The evaluation of one's own body and how it functions, with special attention on how one thinks or fantasizes that it looks or performs to others.

Brain-Injured - (a) Severly brain-injured: Child injured so badly that he cannot move or make a sound. Any additional injury would produce death; (b) Moderately brain-injured: Cannot talk or walk; (c) Mildly brain-injured: Walks and Talks poorly; (d) Strauss Syndrome: Hyperactive, uncoordinated, unable to concentrate, has learning problems.

APPENDIX IV.D. (continued)

Choreiform - Involuntary and irregular jerking movements.

Cortex, brain - Outer surface of brain, which contains nerve cells and interconnections.

C.N.S. - Central Nervous System.

Cyanosis - Blueness of the skin due to insufficient oxygen in the blood, as a result of poor circulation or, especially in the newborn, delayed or insufficient breathing.

Distractibility - An abnormal variation of attention. Inability to fix attention on any one subject for an appropriate amount of time, due to C.N.S. impairment which prohibits necessary monitoring of stimuli.

Dyscalculia - A specific learning disability in which the basic concepts and relationships of numbers (mathematics) are poorly understood and integrated and which requires special teaching methods and techniques to remedy.

Diadochokinesis - The function of arresting one motor impulse and substituting for it one that is diametrically opposite. A neurological test for evaluating coordination.

Dysfunction - Partial disturbance, impairment, or abnormality of the functioning of an organ, e.g. minimal brain dysfunctioning.

Dyagraphia - Inability to write properly because of ataxis, tremor and/or impaired visual-motor-perceptual systems.

Dyskinesia - Poorly coordinated. Impairment of the ability of voluntary movement, resulting in fragmentary or incomplete movements.

Dyslexia - Specific learning disability in individuals of average general intelligence who have great difficulty in learning to read because of impaired visual-motor-perceptual systems. An inability to read understandingly and at the appropriate level of difficulty due to minimal brain dysfunctioning. A condition in which good reading is possible, but which requires special teaching and training.

APPENDIX IV.D. (continued)

Echolalia - The meaningless repetition by a person of instructions or words addressed to him; frequently observed in the mentally deficient.

E.E.G. - Electroencephalogram or brainwave tracing. An aid in neurologic diagnoses.

Encephalitis - Inflammation of the brain. There are many types, most of which are due to virus infections and which can damage one or many parts of the brain. It is a frequent cause of learning and behavior disorders because of the resultant brain dysfunctioning.

Equivocal - Of uncertain nature or classification. Possibly an indicator or sign of a condition.

Etiology - The study or theory of the causation of any disease; the sum of knowledge regarding causes of a condition.

Gestalt - A form, a configuration, or a totality that has, as a unified whole, properties which cannot be derived by summation from the parts and their relationships.

Hyperactivity - Abnormally increased motor activity.

Hyperkinesis - The medical term for hyperactivity. Abnormally increased mobility, abnormally increased motor function or activity.

Hypoactivity - Abnormally diminished motor activity or function.

Idiopathic - Self-originated; of unknown origin.

Irremembrance, auditor - Loss of power to recall auditory memories due to lesion of temporal lobe.

Kinesthetic - Pertaining to the sense by which muscular motion, weight, position, space orientation, etc., are perceived.

Labile - Gliding; moving from point to point over the scale; unstable.

Laterality - The tendency, in voluntary motor acts, to use preferentially the organs (hands, feet, ears, eyes) of the same side.

Confused laterality - Inability to distinguish right from left.

APPENDIX IV.D. (continued)

Mixed (crossed) laterality - The preferential use, in voluntary motor acts, of heterolateral members of the different pairs of organs, e.g. to the right handed, but left eyed.

Lesion, brain - Damage to structure of any part from injury or disease.

Lobe - One of the five major anatomical subdivisions of the brain. The occipital lobe serves vision and the temporal is mainly auditory.

Mental Age - Age level of mental ability as determined by standardized tests.

Minimal Brain Dysfunction - This diagnosis category refers to children of average or above general intelligence with learning and/or behavior difficulties ranging from mild to severe, which are due to subtle deviations arising from genetic variations, perinatal brain insults, metabolic imbalances, biochemical irregularities, and/or illnesses and injuries sustained during the years critical for the development and maturation of those parts of the central nervous system having to do with perception, language, inhibition of impulses, and motor control.

Nystagmus - An involuntary rapid movement of the eyeball, which may be horizontal, vertical, rotary, or mixed, i.e., of two varieties.

Organic - Arising from the organism hence physical in nature.

Pathological - Abnormal or diseased.

Perception - The receiving, integration, and interpretation of impressions and sensations through the senses.

Perserveration - Continuing to respond to stimuli when no longer appropriate.

Prognosis - A forecast as to the probable result of an attack of disease, the prospect as to recovery from a condition as indicated by the nature and symptoms of the case.

Reauditorization - Ability to recall name or sounds of visual symbols (letters).

APPENDIX IV.D. (continued)

Stigma (singular), Stigmata (plural) - Any mental or physical mark or peculiarity which aids in the identification or in the diagnosis of a condition.

Strabismus - Deviation of the eye which the individual cannot overcome. The visual axes assumes a position relative to each other different from that required by the physiological conditions. Squit; crossed eyed.

Strephosymbolia - Twisted symbols observed in reading and writing, e.g. was for saw.

Symptom - Any functional evidence of disease or of an individual's condition; a characteristic or sign indicative of some physical or mental state or condition.

Syndrome - A set of symptoms which occur together; the sum of signs of any condition or state; a symptom complex.

Synkinesis - An associated movement or twitching, as of the face.

Tonus - The slight, continuous contraction of the muscles, which in skeletal muscles aides in the maintenance of posture and in the return of blood to the heart.

Visuo-motor coordination - Accurate adjustment of movement to accord with the incoming visual stimuli.

APPENDIX IV.E.Information Sources for ParentsLEARNING DISABILITIES

- Allegra, James. Guide for parents of children in Special Education. Rehabilitation Literature, September, 1969, Vol. 30, #9.
- Carline, Donald. Preparing your child for reading. Helping your Child Grow in Reading. International Reading Association. Newark, Delaware.
- Cruickshank, William. The brain-injured child in home, school, and community. Syracuse University Press, Syracuse, New York, 1967.
- Engel, Rose. Language Motivating Experiences for Young Children. DFA Publishers: 6518 Densmore Avenue. Van Nuys, California 94106.
- Frey, Marybeth. ABC's for Parents. Rehabilitation Literature. September, 1965. Vol. 26, #9. National Easter Seal Society.
- Golick, Margaret. A Parent's Guide to Learning Problems. Quebec Association for Children with Learning Disabilities, 1970.
- Gordon, Ira. Baby Learning through Baby Play. St. Martins Press, 1970.
- Greenblatt, Augusta. Hidden Handicaps to Learning. Parent's Magazine, October, 1970.
- Kronick, Doreen. They Too Can Succeed. A practical guide for parents of learning-disabled children. San Rafael, California: Academic Therapy Publications, 1969.
- Lewis, et. al. The Other Child. New York: Grune & Stratton, 1966.
- One Million Children. The CELDIC Report. Published by Leonard Crainford for the Commidion on Emotional and Learning Disorders in Children, 1970.

APPENDIX IV.E. (continued)

Perceptual Motor Activities in the Home. ED 039 676. Available from Merrimack Education Center, 101 Mill Road, Chelmsford, Mass. 01824.

Pines, Maya. Revolution in Learning. New York: Harper & Row, 1970.

Smith, B. Your Nonlearning Child. Boston: Beacon Press, 1968.

Teach Your Child to Talk. Grand Rapids Educational Book Co., 3099 Perkins, N.E. Grand Rapids, Michigan. 49505

Office of Child Development, 400 6th St., S.W. Washington, D.C. 20013

USOE Bureau of Education for the Handicapped (BEH) 7th and D. Streets, S.W., Rm. 2100, Washington D.C. 20202

The CEC Information Center, 1411 South Jefferson David Hgwy., Suite 900, Arlington, Virginia 22202

New England Materials-Instruction Center, Boston University, 704 Commonwealth Ave., Boston, Mass. 02215

Closer Look, P.O. Box 1492, Washington, D.C. 20013

Special Education Information Center (SEIC), Directory of Institutions and Programs for Education of Handicapped Children in the United States.

Handbook of Services for Emotionally Disturbed Children in Massachusetts. Frank Garfunkel. Special Education Department, Boston University. Available at NEMIC.

Directory of Facilities for the Learning Disabled. Academic Therapy Publications. San Rafael, California

Guide to State & Private Agencies, Schools & Centers for Handicapped Children. 1969. Merrimack Education Center, 101 Mill Road, Chelmsford, Mass. 01824

Educational Evaluation Center, Box 173. Dunstable, Massachusetts. 01827.

APPENDIX V.

Evaluation Questionnaires

APPENDIX V.A.Evaluation Questionnaire (used 5/71)

Would you kindly fill out the enclosed questionnaire and return it to the
 Merrimack Education Center
 101 Mill Road
 Chelmsford, Mass. 01824

Your recommendations and suggestions will be taken into consideration in any future programs offered by the Center in conjunction with local communities.

Last Name _____ First Name _____

Address _____

Phone _____ Date of Birth _____

Marital Status:

Single Married Divorced Widowed Separated

Number of Children _____ Ages _____

Educational History: Circle the number of school years you have completed:

1 2 3 4 5 6 7 8 9 10 11 12

College: 1 2 3 4

Name of last school attended _____

Last date you attended as a student _____

Name of School _____ Location _____

Describe briefly any special training, hobbies, or interests that you found useful in assisting at school in this training program.

Previous Experience

Your last full or part-time position _____

Teacher aide experience or volunteer experience _____

APPENDIX V.A. (continued)

Check the grade levels at which you assisted while in this training program:

preschool _____ Primary (1-3) _____ Intermediate (4-6) _____
 Junior High (7-9) _____

Did you work with groups? _____ Individuals? _____ Both? _____

How many groups? _____ How many children per group? _____

How many children did you see individually? _____

II. Our objectives at the outset of this program were the following:

- a. To develop an appreciation for the paraprofessional's role as part of the school system.
- b. To develop competency in applying skills necessary for effective tutoring of individuals and small groups.
- c. To provide assistance for teachers of exceptional children to meet individual needs.
- d. To develop a model for communications between learning disabilities specialists and paraprofessionals.
- e. To provide individualized attention for students with learning handicaps.

Rank these objectives in order of importance to you:

_____ (1=most important)
 1 2 3 4 5

Please circle a numeral that indicates how well you feel this objective was accomplished.

	Not at all					Extremely Well
Objective a	1	2	3	4	5	6
Objective b	1	2	3	4	5	6
Objective c	1	2	3	4	5	6

APPENDIX V.A. (continued)

III. In your opinion, to what extent has this workshop been helpful to you in the areas described below?

	No Help					Extremely Helpful
a. Understanding child development	1	2	3	4	5	6
b. Getting along with children	1	2	3	4	5	6
c. Understanding what the teacher is trying to do	1	2	3	4	5	6
d. Working with the teacher	1	2	3	4	5	6
e. Understanding the difference between the teacher's role and the role of the paraprofessional	1	2	3	4	5	6
f. Understanding how and why children fail to learn	1	2	3	4	5	6
g. Preparing instructional materials	1	2	3	4	5	6
h. Carrying out the teacher's instructions	1	2	3	4	5	6
i. Working with small groups	1	2	3	4	5	6

IV. Please circle the numeral that best indicates your opinion concerning the training course.

Scale: 1 = None; not at all
 2 = To a very small extent
 3 = Somewhat
 4 = Rather well, moderately well
 5 = Quite well; to a high degree

APPENDIX V.A. (continued)

- | | | | | | | |
|---|---|---|---|---|---|---|
| 1. I would recommend similar training for other parents to this degree | 1 | 2 | 3 | 4 | 5 | 6 |
| 2. The course as a whole has this degree of value to me | 1 | 2 | 3 | 4 | 5 | 6 |
| 3. The opportunity to participate with other paraprofessionals had this degree of value | 1 | 2 | 3 | 4 | 5 | 6 |
| 4. The information presented provided me with new ideas to this degree | 1 | 2 | 3 | 4 | 5 | 6 |
| 5. The course provided assistance to me in considering local school concerns for learning disabilities to this degree | 1 | 2 | 3 | 4 | 5 | 6 |
| 6. The training course encouraged me to consider the furthering of my educational and vocational goals to this degree | 1 | 2 | 3 | 4 | 5 | 6 |
| 7. The training course improved my own self-concept to this degree | 1 | 2 | 3 | 4 | 5 | 6 |
| 8. My understanding of the role of the paraprofessional is clear to this degree | 1 | 2 | 3 | 4 | 5 | 6 |
| 9. The course has influenced by thinking about my own future goals to this degree | 1 | 2 | 3 | 4 | 5 | 6 |
| 10. I possess the competence to fulfill the duties of a paraprofessional to this degree | 1 | 2 | 3 | 4 | 5 | 6 |
| 11. I support the practice of utilizing teacher assistants for instructional purposes to this degree | 1 | 2 | 3 | 4 | 5 | 6 |
| 12. I believe that the course content was | | | | | | |

APPENDIX V.A. (continued)

13. I am able to understand the special needs of children to this degree 1 2 3 4 5 6
14. I was able to respond to requests for assistance (from teacher and/or pupil) to this degree 1 2 3 4 5 6
15. I was able to make critical observations of pupil needs to this degree 1 2 3 4 5 6
16. Please respond briefly to the following questions:

a) To what extent do you feel you have attained your own personal educational or vocational goals?

b) Describe in a few words what you feel would help you achieve your future educational/vocational goals.

c) Do you have a clearer understanding of the role of a teacher assistant? Yes _____ No _____
How would you describe that role to other parents?

d) What other types of training would improve the skills of the paraprofessional?

e) In what areas do you believe you were most helpful in the classroom situation?

APPENDIX V.A. (continued)

f. Do you feel there is a "new" relationship between the educational community and yourself as a result of this training program?

g. How do you think the utilization of paraprofessionals is relevant to today's educational needs?

APPENDIX V.B.OPINIONAIRE

Directions: Please encircle the numeral after each item that best describes your opinion of the assignment of the task to the paraprofessional teaching assistant. Use your judgment as to the appropriate assignment of the task.

- 1 = Not at all; never
 2 = To a very small degree; seldom
 3 = Occasionally
 4 = Often
 5 = Most of the time; routine
 6 = Always

- | | | | | | | |
|---|---|---|---|---|---|---|
| 1. Playing games with pupils (such as rhyming games, guessing games, finger games). | 1 | 2 | 3 | 4 | 5 | 6 |
| 2. Interesting a restless pupil in some available activities. | 1 | 2 | 3 | 4 | 5 | 6 |
| 3. Listening to pupils talk about themselves. | 1 | 2 | 3 | 4 | 5 | 6 |
| 4. Listening to a pupil tell a story. | 1 | 2 | 3 | 4 | 5 | 6 |
| 5. Taking charge of a small group which is working on a special project while the teacher works with another group. | 1 | 2 | 3 | 4 | 5 | 6 |
| 6. Acting out stories with pupils. | 1 | 2 | 3 | 4 | 5 | 6 |
| 7. Reading and telling stories to pupils. | 1 | 2 | 3 | 4 | 5 | 6 |
| 8. Explaining school rules to pupils. | 1 | 2 | 3 | 4 | 5 | 6 |
| 9. Helping a pupil use a teaching machine. | 1 | 2 | 3 | 4 | 5 | 6 |
| 10. Telling a pupil what happened when he was absent. | 1 | 2 | 3 | 4 | 5 | 6 |
| 11. Helping pupils move from one activity to another in the classroom. | 1 | 2 | 3 | 4 | 5 | 6 |

APPENDIX V.B. (continued)

14.	Attending meetings with teachers.	1	2	3	4	5	6
15.	Showing pupils how to clean up and put away materials.	1	2	3	4	5	6
16.	Helping pupils understand teacher's directions.	1	2	3	4	5	6
17.	Giving the teacher information about a pupil which will help the teacher in working with him.	1	2	3	4	5	6
18.	Helping a pupil learn to do something new and perhaps a little more difficult than he thinks he can do.	1	2	3	4	5	6
19.	Writing down what a pupil is doing.	1	2	3	4	5	6
20.	Keeping a record of how a group of pupils work or play together.	1	2	3	4	5	6
21.	Giving a pupil a chance to show he can do something well.	1	2	3	4	5	6
22.	Encouraging pupils to help each other.	1	2	3	4	5	6
23.	Helping pupils learn to plan together (such as teaching them to take turns, share toys and other materials).	1	2	3	4	5	6
24.	Helping a pupil look up information in a book.	1	2	3	4	5	6
25.	Helping pupils pick out books in the library.	1	2	3	4	5	6
26.	Tutoring individual students.	1	2	3	4	5	6
27.	Working with small groups on a project.	1	2	3	4	5	6
28.	Demonstrating to the class.	1	2	3	4	5	6

APPENDIX V.B. (continued)

31. Leading class discussion.	1	2	3	4	5	6
32. Correcting student oral speech errors.	1	2	3	4	5	6
33. Being in complete charge of the class for an hour.	1	2	3	4	5	6
34. Being in complete charge of the class for brief periods.	1	2	3	4	5	6
35. Dictating objective tests, spelling words, etc.	1	2	3	4	5	6
36. Reading to the class.	1	2	3	4	5	6
37. Acting out stories.	1	2	3	4	5	6
38. Introducing a new concept.	1	2	3	4	5	6
39. Correcting standardized and informal tests and preparing pupil profiles.	1	2	3	4	5	6
40. Correcting homework and workbooks, noting and reporting weak areas.	1	2	3	4	5	6
41. Preparing instructional materials -- cutouts, flash cards, charts, transparencies, etc.	1	2	3	4	5	6
42. Collecting and arranging displays for teaching purposes.	1	2	3	4	5	6
43. Preparing special learning materials to meet individual differences -- developing study guides, taping reading assignments for the less able readers, etc.	1	2	3	4	5	6
44. Assisting in drill work with word, phrase, and number flash cards.	1	2	3	4	5	6
45. Assisting and checking pupil work.						

APPENDIX VI.

Training Experience of
The Merrimack Education Center

APPENDIX VI.B.

Timmy - A Case Study

by

by Mrs. G. (a typical instructional assistant)

APPENDIX VI.B.

Timmy -- A Case Study

I'd like to leave the technical aspects of the program to the others and tell you about a little boy I have been working with during my paraprofessional training, whom I'll call Timmy. When I met Timmy he had been attending school for two and a half years, but he had never learned to read. Although he has an average I.G. he is perceptually handicapped; he is unable to recall or retain visual forms or auditory information, such as the sounds and shapes of letters. Since the Learning Disabilities professional was working in both areas, an instructional aide was working on the alphabet with him, and a speech teacher was working on his speech problems, I decided I needed a new and different approach. While studying the problems involved, I mentally went over the use of the senses. The other teachers were using a visual, auditory, and tactile method. At the same time, I remembered that our instructor had stressed the use of concrete examples. With this in mind, I decided that if the old saying is true, and that the way to a man's heart is through his stomach, then perhaps I could reach a small boy's brain through his taste buds; so I began to map out my gustatory approach.

Children like Timmy are conditioned to failure; one of the most important things we have been taught to do as paraprofessionals is to break this failure pattern. We try to develop a warm personal relationship with the child on first contact. Each activity we perform with the child is structured so that it has a built-in success pattern, what I call "instant success", so that the child leaves the lesson feeling successful and rewarded. Above all, we try to build up his self-image and instill confidence in him; therefore, we break each task down to a primary level. We use various methods and techniques to achieve this success and never let a task reach a frustration level, so I decided to start with just two letters, the "a", and the "t".

For the first lesson, I bought the shiniest red apple I could find, and introduced the short "a". Using a magnetic board and brightly colored plastic letters that he could hold in his hand, I went over and over the sound of the short "a". We traced it in sandpaper, wrote it with a bright red magic marker, and talked about words that began with the sound "a".

APPENDIX VI.B. (continued)

ber how you ate the short "a"?" While he was eating the apple, I took the letter "t" and placed it on the corner of the board. I explained the "t" sound to him, told him it looked like a telephone pole, and he traced the sandpaper "t" with the tips of his fingers, while saying the sound over and over. I gave him a Tootsie Roll as a tangible expression of the letter "t" and explained that it was a consonant. I told him that consonant means "singing with", and that the consonant was going to sing with the vowel to make a word. Over and over we traced, wrote, and sounded the two letters. While he was eating the Tootsie Roll, I put the "a" in the top left hand corner of the magnetic board and the "t" in the top right hand corner and said, "I wonder what would happen if we put the two letters together. So I brought them together and sounded out "at". I explained that "at" was a family, just like his family, and every one had the same last name but they all had a different first name. The consonants that he knew would provide the first names. Then I brought "b" over, sounded it, told him it was something used to hit a baseball with, and he said, "Bat". Then I broke the word down, letter by letter, so he could see how we got the word.

The lesson was almost over, so I thought I would show him some other consonant combinations; I used "c", "f", "m", and "r", to make the words, "cat", "fat", "mat", and "rat". He sounded them out with me, and I was pretty sure that he knew them; whether he would remember them was another matter. As I turned away from him to put the board away, I heard him make a startled noise. I turned quickly to see what had happened, and was struck by the expression on his face. He looked like someone who had come out of a long, dark, tunnel into the sunlight for the first time. With a face like April, half smile, half tears, he explained, "I can spell a word. Bat, b-a-t." I could hardly believe it. I explained that if he could spell "bat", he could also spell "at", "cat", "fat", "sat", and "mat". I extended the lesson another ten minutes, and gave him a spelling lesson to reinforce what he had learned.

Before he left, I put a seal on his forehead, but he really didn't need it. He was so thrilled with his discovery that he really didn't need it. When we got back to his room he used the magnetic board to read for his teacher; she could hardly believe it. Then she said that she would give him these words for a spelling test when the other children had their test.

The week passed very slowly for me until our next lesson; I was in a state of suspense wondering whether he would remember, or

APPENDIX VI.B. (continued)

if I had to start all over again. His teacher told me he had received one hundred on his spelling test and still remembered the words.

So, we started again, and the next letter we worked on was the short "o" sound. I wanted to get him reading a sentence if possible, before my eight weeks were up. In the meantime, while getting acquainted with Timmy, I had learned that he was a real hockey fan. He knew all the vital statistics of the Bruins by heart, so from then on all my lessons were hockey-oriented, and Bobby Orr was my logical choice for the short "o" sound, along with an orange. Using a large, brightly-colored picture of Bobby Orr as a background, I made up a tachistoscope for the "og" family, and Timmy quickly learned the words, "dog", "log", "hog", "fog", "jog", etc. Then I made up small cards using the words he knew, and with a large metal board and some magnets, we were able to build sentences. With the addition of a few sight words, such as "the", "on", and "in", which I reinforced at every lesson, he was able to build about forty sentence combinations on the board, such as, "The fat cat sat on the mat.", or "The dog sat on the log in the fog." I also made up small cards with pictures of Derek Sanderson and Bobby Orr, which Timmy used instead of a noun for the subject, so that "Derek Sanderson sat on a log in the fog.", and so did Bobby Orr. In fact, they probably spent as much time on that log as they did in the penalty box. As we progressed, I introduced the color words, writing them in their own color on small cards, so that he could read, "The brown dog and the white cat sat on the black mat."

When he had mastered the sentence combinations, I made a book for him, using brightly-colored cut-outs from greeting cards, and the words he knew. The first book was called, "Matt the Monkey", and he loved it. The teachers will understand what I mean when I say that he began to pick up visual and contextual clues. He read the book at the drop of a hat for everyone, teachers, neighbors, and even the principal. Everyone praised him. He was absolutely thrilled, and of course, every reading reinforced his skills. As we went along, we used the same method to get through the "in", "am", and "ot" families; I used wheel-shaped pretzels, a small cast iron whale, and a white peppermint for the diagraph "wh", and alphabet cookies and animal crackers for other letters. He has been getting one hundred every week in spelling, too. Of course, he is not using the words the rest of the class is using, but he is on his way, and that is the important thing.

APPENDIX VI.B. (continued)

Next week I plan to introduce the short "e" sound. I have the "et" family printed in black letters on a bright orange card which is clipped to a ping pong paddle. The paddle is a modern version of the old-time hornbook, and it is easy for him to hold; plus that, it seems to focus his complete attention on the words and helps to increase his power of concentration.

For the short "e" sound, I plan to use a toy elephant that walks down hill, a chocolate egg, and Phil Esposito. Between the two of us, he ought to make it.

In closing, I should tell you that all through our lessons Timmy has never been able to remember my name. I could have reinforced it, but I didn't feel it was that important, and I begrudged any time it would detract from my lessons. His teacher told me that he refers to me as, "that older woman who taught me to read". And that suits me fine; I couldn't ask for a better title.

BIBLIOGRAPHY ON INSTRUCTIONAL ASSISTANTS

- Avco Economic Systems Corporation. The Preparation of BIA Teacher and Dormitory Aides. Vols. I, II, and III. April, 1968.
- Arth, A. et al. The Teacher Aides. Preparation and Utilization of Paraprofessionals. Curry Memorial School of Education. University of Virginia. Charlottesville, Virginia. 1971.
- Blessing, K. "Use of Teacher Aides in Special Education." Exceptional Children, 34;#2, 1967.
- Erb, Jane. "Use of Paraprofessionals." Educational Leadership. January, 1972. 29, #4.
- Education U.S.A. "Differentiated Staffing." Special Report. National School Public Relations Association. Washington, D.C., 1970.
- Ferver, J. Teacher Aides Handbook. Center for Extension Programs in Education. University Extension. University of Wisconsin.
- Howe, Ann. Teacher's Aide or Teacher's Maid. Early Years. February, 1972.
- Kern, J. What Teacher Aides Can and Cannot Do. Nations' Schools, Vl. 82, #2. August, 1968.
- NEA Task Force on Paraprofessionals. Today's Education. Vol. 58 #7. October, 1959).
- Shank, P. and McElroy. The Paraprofessional. Michigan: The Pendell Publishing Co., 1970.
- Shields, O. L. Learning Disabilities. A Handbook for Tutors. Jefferson County Schools. Louisville, Kentucky.
- Wright, Betty. Teacher Aides to the Rescue. New York: John Day Company, 1969.