One of a series of materials developed by Project APT (Administrators, Parents, and Teachers/Assessment, Programing, and Training), a program designed to foster home/school coordination in educational planning and program implementation for severely mentally retarded and/or multiply handicapped students: the booklet provides techniques for the assessment and management of behavior during school meals. Eating skills are divided into four levels and a chart indicates the functioning level, positioning requirements, adaptive equipment needs, food preparation considerations, and training strategies for each level. Environmental considerations, such as room temperature, are discussed as are the materials to have available. Brief guidelines for the management of mealtimes are provided. A list of 16 publishers and equipment suppliers specializing in information and materials for the management of meals and the evaluation forms for the four levels are included. (PHE)
MAKING MEALTIME MANAGEABLE

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Department of Special Services
Fairfax County Public Schools
Fairfax, Virginia
Making Mealtime Manageable

Kilmer Center is a self-contained school which serves pupils displaying a broad spectrum of handicapping conditions. The student population ranges from the moderately retarded pupil with minimal or no physical problems to the severely and profoundly retarded child with significant physical involvement throughout the body. The diverse needs of approximately 200 students present a unique challenge to the staff member responsible for providing therapeutic and logistical support for the lunchtime program. Cooperation of all staff members is a basic requirement for a smooth-functioning lunch period. It is essential, however, to have one professional (teacher or therapist) who is ultimately responsible for the physical well-being of each student.

The accompanying matrix is an attempt to describe the functional level of the four basic lunchtime groups of students at Kilmer Center. The large enrollment makes it imperative to categorize the eating skills of our pupils and to provide a written assessment or evaluation of these skills for each student. While this matrix was developed with the population of Kilmer Center in mind, the resulting categorization can be most helpful to any professional who is trying to bring some degree of order to the confusion of lunchtime. A perusal of the matrix, "Grouping of Children by Functional Level" shows a grouping of students by their abilities. This classification ranges from the moderately retarded student who requires minimal assistance in the physical skill of eating to the low functioning, physically handicapped pupil who requires maximum assistance.
Levels I and II, as described in the grid, do not require on-going, in-depth attention from the occupational or speech therapist. But thoughtful consideration of the needs of these pupils by the classroom teacher, consulting with the occupational therapist or speech clinician when necessary, will guarantee that an appropriate learning experience is a part of the lunchtime program.

The 5” x 8” lunchtime assessment card (a sample of which follows this text) incorporates the information needed to supervise those students described as Level I or II. This assessment is relatively short and its completion by the student’s homeroom teacher does not require a great deal of time. Any questions which arise can be resolved by the staff occupational, physical, or speech therapist, any one of whom may act as consultant to the lunchtime program. These cards, placed in a file box, the location of which provides easy access to all, gives any staff member or volunteer instant data on any Level I or II pupil. He or she can then provide appropriate assistance to those students who require it, but can avoid the oversolicitous approach which can easily develop when one is uninformed. Consistency in all phases of the lunchtime program, especially behavior management techniques, can then be achieved.
and IV, by the very nature of the severe disabilities exhibited, require an in-depth lunchtime process. A description of these factors can be found on the lower half of the accompanying matrix. This evaluation is done by the occupational or speech therapist. Included in this section of the evaluation form for Levels III and IV, as used at Palmer Center. It attempts to analyze all facets lunchtime program which influence success. The first page of the evaluation form for Levels III and IV describes the pupils' current level of functioning as it relates to the eating process. (A more complete evaluation of the pupils' areas of physical dysfunction can be found in the therapists' files as well as the pupils' permanent central folder.) The next item is the pupils' current long range goal. This is a behavioral description of what the pupil can be expected to do at the end of the school year. The next item on the form is the name of the monitor or person who actually assists the pupil during lunch. Consultants (those who provide professional advice or support to the caregiver) are also listed. The lower half of the first page of the evaluation provides space to list the current behavioral objectives for the pupil. It is assumed that as objectives are met, new ones, increasing in complexity, will be added. This page of the evaluation provides a quick, graphic analysis of success or points out the need to re-evaluate so that different goals and objectives can be established. Thus, the lunchtime program can be incorporated into the pupil's IEP, an important consideration for the severely and profoundly retarded child who is physically handicapped.

The second page of the Level III and IV evaluation presents a detailed instructional plan written by the therapist which describes the three areas to be considered. These are explained more fully in the following section:
A. Environment

The placement of the student in the lunchroom can be very important. For instance, some pupils function significantly better if seated with their chairs turned away from the distractions of other students. On the other hand, some eat lunch more quickly if they can see the activity in the lunchroom and thus are not constantly trying to twist around in their chairs to satisfy their curiosity.

Lighting in the room can be a consideration because bright light can be an irritant to some children. Therefore, these pupils will be much happier during lunch if their backs are to the window or the light source. The source of outside light can be controlled or modified by the use of venetian blinds or even paper taped to the window.

Too high a temperature can make everyone, students and staff alike, very uncomfortable during lunch, but the reverse can be even more critical to the well-being of some students. For example, cool, drafty lunchrooms can severely affect the performance of a cerebral palsied student. Muscles become tight and function can become very limited.

Environmental noise, such as sounds from dishwashers, fans, dropping of trays, and scraping of chairs, can increase the startle response in some pupils, affecting the ease with which they chew or swallow. Sometimes, it can be helpful to set up a smaller room for the use of the severely involved students in which the environmental factors are more easily controlled.

The optimum positioning of the severely physically handicapped student usually entails the adaptation of special seating equipment. Positioning is probably the single most important consideration in preparing the student for lunch. It is difficult to be specific about adaptive seating equipment. There are as many variations as there are students with handicapping conditions, and, if at all possible, a physical or occupational therapist should make the adaptations dictated by the physical deformities of each pupil.
B. Materials

This part of the evaluation refers to those items essential to have immediately at hand when starting the actual feeding process. It is disruptive, non-productive, and time-consuming to start the lunchtime program with a student, and then spend ten minutes hopping up and down accumulating the necessary implements. Essential items are:

1. bib or towel with clothespin or diaper pin
2. special dish
3. sticky pad
4. special cup (or straw, if appropriate)
5. special spoon
6. grinder (baby food mill if school does not have institution grinder in the kitchen)

1. Bib: May be adequate coverage for a limited number of pupils, but, in most instances a TOWEL around the neck offers more complete protection from falling food. A snap clothespin serves to fasten the towel around the neck. In some instances, a clothespin acts as an irritant and a diaper pin with a protected point is a better choice.

For the student who is progressing in his or her self-feeding program, a large bath towel fastened around the neck may be used, with the far end of the towel laid on the table and the dish or tray placed on top. The draped towel catches food which falls off the spoon and also serves to stabilize the dish for a student in a wheelchair.

Adequate protection of the pupil's clothing is not an insignificant consideration. Many well-planned therapeutic feeding programs have been less than successful because staff members or volunteers have been turned off by the sight of a child covered with the remnants of a partially chewed lunch.
2. **Special Dish:** Is not a consideration if the pupil requires total assistance. However, if a self-feeding program has been initiated, a specially shaped dish designed for easy scooping is essential.

3. **Sticky Pad:** Helps to stabilize the dish for a beginning self-feeder. These are available commercially, or a wet washcloth (well wrung out) can be placed under the dish. The wash cloth is not as effective as the sticky pad, but is considerably cheaper if cost is a major consideration.

4. **Special Cup:** Can tip the scales in favor of success when cup drinking is introduced. Plastic cups of this type have a U-shaped cutout which accommodates the pupil's nose when he or she is drinking and are available commercially. As a stop-gap solution, the U-shape can be torn out of a paper cup. These cups work well for the severely involved cerebral palsied pupil who finds it difficult to swallow or to attempt to hold the cup.

There are a variety of cups on the market designed for the less physically involved student. Covered cups which have slots that allow the liquid to escape are not advised because they do not promote proper drinking patterns.

Straw-drinking is a common sight in most school cafeterias and is an efficient, non-messy way to serve milk or juice at lunchtime. It is appropriate for the retarded child whose oral skills are functional. Straw-drinking is not appropriate for the cerebral palsied student because it aggravates already present abnormal oral reflexes and patterns.

5. **Special Spoons:** Come in an almost infinite variety of shapes and sizes. For the severely involved pupil, the Teflon-coated infant spoon is most suitable because it protects the soft tissue of the tongue and mouth from injury. This is especially important for the cerebral palsied pupil with a strong bite reflex. It is possible to order from special catalogs a complete assortment of sizes and shapes with a variety of special handles. Sometimes it becomes necessary to adapt a utensil on site for a specific pupil if his or her unique needs cannot be met by commercial products.

6. **Grinders:** Make it possible for the pupil with severe oral dysfunction to participate in the same menu as the rest of the students. If the student is not quite ready for the lumpiness of fork-mashed foods, ground food is an appropriate alternative. Commercial pureed or junior foods do not offer the variety or texture of lunches ground in the cafeteria.
C. Strategies

Each handicapped student has his or her unique problems at lunchtime. This section of the evaluation may be the most useful to the staff member assigned to feed or assist a specific pupil.

1. Physical: The therapist may suggest methods to relax the neck, shoulder girdle, and arms of the student so that presentation of the spoon does not trigger abnormal patterns of movement. The position of the pupil’s head can help to normalize mouth opening and removal of food from the spoon. The manner and placement of the spoon in the pupil’s mouth can diminish tongue thrust and thereby assist the processing of the food before it is swallowed. In some instances, the feeder can apply jaw control of varying degree (always remembering the degree of “hands-on” control should be carefully monitored and should be withdrawn as the pupil's own skills improve). These same techniques can increase the success rate in cup-drinking. Small sips from the cup, offered at frequent intervals throughout the meal will result in an improved swallowing of liquids. A half-cup of liquid poured too quickly can result in choking, or the saturation of the pupil’s clothes. Fluid intake for the physically involved, low-functioning pupil who has no expressive language is an all-important consideration. Opportunities for drinking must be made throughout the school day, as well as at lunchtime.

2. Behavioral: Many physically handicapped students become manipulative and even recalcitrant at mealtime. The staff member who is feeding such a pupil must remain firm, pleasant, and consistent in his or her approach to negative behaviors. A verbal reprimand is enough to remind some students to cooperate. Others need to be “timed-out” by turning their wheelchairs or chairs away from the table for a few minutes. Any strategies used during lunch must be devised with the knowledge and assistance of the classroom teacher. If negative behaviors become the most overwhelming element at mealtime, a behavior management specialist should be consulted.

An often ignored element of the management of manipulative behaviors at lunch is the time factor. Physically handicapped pupils must realize that lunch is a finite process, and that after a predetermined amount of time has passed, the meal is over. This is not only important for the student, it is also important for the staff member who is feeding. When a pupil’s lunch is only half eaten, feelings of guilt are not uncommon among feeders. To prolong lunchtime tires the student and does not serve the best interests of either pupil or staff member.

In conclusion, the staff member must walk a fine line between unthinking stuffing of food into the mouth of the physically handicapped child and the over-solicitous and suffocating attention to the pupil’s problems. Compassion and intelligent concern for the pupil's dignity must be maintained — the end does not justify the means.

It is not the purpose of this packet to describe in detail the therapeutic techniques and strategies used in the feeding of the severely physically involved student. Each student's needs must be evaluated by a therapist in cooperation with the teacher, and the lunchtime program must be tailored to the child's unique requirements.
In the following reference list, there are several publications which are invaluable sources of information concerning the positioning of the physically handicapped student. *Handling the Young Cerebral Palsied Child at Home* by Nancie R. Finnie, for example, provides the techniques and strategies required to help the handicapped pupil accept, chew, and swallow food. An equally useful book is *Oral-Motor Function and Dysfunction in Children* edited by Janet M. Wilson.
References

The following references may be helpful in planning mealtime strategies. The materials are listed from the general to the specific.

*Eating with a Spoon—How to Teach Your Multihandicapped Child*
  Mary Bowman, Abigail B. Calkin, and Patrick A. Grant
A general, common-sense book. Text is brief with back pages designed for record-keeping. A good book for parents of retarded children who are not severely involved physically.
Available from:
  Public Sales Division
  Ohio State University Press
  2070 Neil Avenue
  Columbus, Ohio 43210

*Feeding the Handicapped Child*
  Mary Ann Harvey Smith, Editor
A general discussion of feeding the retarded child. Nutritional information is emphasized with details of feeding the severely involved child limited to one chapter.
Available from:
  Child Development Center
  Department of Nutrition
  711 Jefferson Avenue
  Memphis, Tennessee 38105

*A Step-by-Step Learning Guide for Retarded Infants and Children*
  Johnson and Wernrr
A short general section of task analyses of the various components of the eating process.
Available from:
  Syracuse University Press
  Syracuse, New York 13210

*Guide to Early Developmental Training*
  Wabash Center for the Mentally Retarded, Inc.
Developmental checklist of feeding goals with suggested activities for each goal. Helpful for teacher as well as therapist.
Available from:
  Allyn and Bacon, Inc.
  470 Atlantic Avenue
  Boston, Massachusetts 02210

*The Right-to-Education Child*
  Myers, Sinco, Stalma
Task analyses for the low-functioning child who is not severely physically involved.
Available from:
  Charles C. Thomas, Publisher
  Bannerstone House
  301-327 East Lawrence Avenue
  Springfield, Illinois 62703
The Illinois Program—Systematic Instruction for Retarded Children, PART III, Self-Help Instruction
Task analysis for the retarded child who is not severely physically involved.
Available from:
Interstate Printers and Publishers, Inc.
Danville, Illinois 61832

The Vulpe Assessment Battery—1978
S. Vulpe
Assessment of feeding and eating skills
Available from:
Canadian Association for the Mentally Retarded
4700 Keele Street
Downsview (Toronto)
Kinsman NIMR Building, York University Campus
Ontario, Canada M3J1P3

Oral-Motor Function and Dysfunction in Children
Janet M. Wilson, Editor
Philosophy, assessments, technique. Excellent book for therapists. Good source for teachers who can ask questions of a therapist.
Available from:
Division of Physical Therapy
Department of Medical Allied Health Professions
School of Medicine, Wing C 221H
University of North Carolina at Chapel Hill
Chapel Hill, North Carolina 27514
(Address all requests to Janet M. Wilson)

Handling the Young Cerebral Palsied Child at Home
Nancie R. Finnie
Excellent source of information on positioning techniques, adaptive equipment, techniques for handling and feeding the severely involved child. Very helpful to classroom teacher and parent.
Available from:
E.P. Dutton and Co., Inc.
2 Park Avenue
New York, New York 10003

Program Guide for Infants and Toddlers with Neuromotor and Other Developmental Disabilities
Connor, Williamson and Siepp
Good source for classroom teacher on all facets of a program for the severely involved. Helpful suggestions for techniques used during feeding.
Available from:
Teachers College Press
Columbia University
1234 Amsterdam Avenue
New York, New York 10027

Beyond Survival, Parts I, II, III
Rental film which discusses equipment, utensils, and techniques used during the feeding of severely involved children.
Available from:
Meyer Children's Rehabilitation Center
444 South 44 Street
Omaha, Nebraska 68131
C.A.D.R.E. Center and P.A.C.E. Program—Feeding Training Modules

#1. Setting the Stage for Feeding
#2. Positioning for Feeding
#3. Ten Steps to Oral Assessment

Three films with accompanying training manuals offering detailed descriptions of all phases of the feeding process.

Available from:
C.A.D.R.E. Center
I.S.D. #911
Cambridge, Minnesota 55008
(Richard Welch, Director)
P.A.C.E. Program
I.S.D. #181
Brainerd, Minnesota 56401
(Dennis Martin, Director)

Functional Aids for the Multiply Handicapped
Isabel P. Robinault, Editor
Gives suggestions for home-made adaptive equipment.

Available from:
Harper and Row, Publishers
Hagerstown, Maryland 21740

Supply Sources

Fred Sammons, Inc.
Box 32
Brookfield, Illinois 60513
A large equipment firm dealing in self-help needs.

Community Playthings
Rifton, New York 12471
A source of well-made adapted chairs for handicapped.

J.A. Preston Corporation
71 Fifth Avenue
New York, New York, 10003
A large equipment firm dealing in adaptive devices, both for school and home.
**Lunchtime Program Evaluation**  
Levels I and II

<table>
<thead>
<tr>
<th>Pupil</th>
<th>Room No.</th>
<th>Date</th>
<th>Amount of Time Needed</th>
<th>Special Preparations</th>
</tr>
</thead>
</table>

### Seating Arrangements
- Type of chair
- Adaptations
- Restraints

### Food
- **School lunch:**
  - Regular
  - Chopped
  - Ground
- **Home lunch:**
- **NVTC lunch:**
- **Beverage:**
  - Milk
  - Water
- **Disposal of:**
  - Paper
  - Utensils
  - Food
  - Plate
  - Tray
- **Container:**
- **Method:**
  - Uses straw
  - Holds Own Cup
  - Needs Cup Held

### Utensils and Adaptive Equipment
- **Spoon**
- **Fork**
- **Knife**
- **Napkin**
- **Bib**
- **Other (Specify)**

### Special Problems
- (behavior management, allergies, special precautions, strong likes, strong dislikes)

### Goals

### Date  Assigned Staff Member  Comments
### Lunchtime Program Evaluation
#### Levels III and IV

<table>
<thead>
<tr>
<th>Pupil</th>
<th>D.O.B.</th>
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</thead>
<tbody>
<tr>
<td>Date</td>
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</table>

**Current Level of Functioning:**

**Current Long Range Goal:**

**Monitor:**

**Consultants:**

<table>
<thead>
<tr>
<th>Date</th>
<th>Current Behavioral Objectives</th>
<th>Evaluation</th>
<th>Date</th>
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16  
13
A. Environmental

B. Materials

C. Strategies
   1. Physical
   2. Behavioral
### Eating Skills/Grouping of Students by Functional Level

#### Kilmer Center/Project APT

<table>
<thead>
<tr>
<th>Level</th>
<th>Physical Function</th>
<th>Positioning</th>
<th>Adaptive Equipment</th>
<th>Food Preparation</th>
<th>Strategies</th>
</tr>
</thead>
<tbody>
<tr>
<td>I</td>
<td>Has functional oral motor skills ... ranges from child who has just started independent eating to child who requires minimum attention but is working on social skills. Drinks from cup or uses straw.</td>
<td>Comfortable chair of appropriate size: hips back in seat, knees flexed and feet flat on floor. When child is seated, elbows should rest comfortably on table.</td>
<td>May range from special dish and spoon on Dycem mat to regular cafeteria tray and utensils.</td>
<td>May range from food cut up in bite-size pieces to little or no preparation of normal serving.</td>
<td>May range from verbal prompt with occasional physical assistance to verbal prompt with minimal physical assistance.</td>
</tr>
<tr>
<td>II</td>
<td>Oral motor skills are functional. Has good sitting balance, but has minimal self-feeding skills. Drinks from cup. May be learning to use straw.</td>
<td>Comfortable chair of appropriate size: hips back in seat, knees flexed and feet flat on floor. When child is seated, elbows should rest comfortably on table.</td>
<td>May use an adapted cup with “nose hole” for drinking, adapted dish and spoon, Dycem mat for stability.</td>
<td>Food may require cutting up or may be mashed with fork.</td>
<td>Needs assistance with self-feeding. Ranges from total physical assistance (modeling) to physical assistance with running commentary, gradually fading to verbal prompt.</td>
</tr>
<tr>
<td>III</td>
<td>Moderately physically involved child. Has functional oral motor skills. Hand function is minimal, Has poor sitting balance. Chews food, but may have problems with drinking.</td>
<td>Adaptive seating equipment; must be carefully positioned for optimum results.</td>
<td>Teflon-coated spoon. May require special drinking cup with “nose hole.”</td>
<td>Food requires mashing with fork or grinding in some cases. Liquid may be added to achieve appropriate consistency.</td>
<td>Food must be placed in mouth. Cup must be held for drinking. Feeder can monitor another child “in-between bites.” Milk swallowed three-four sips at a time.</td>
</tr>
<tr>
<td>IV</td>
<td>Severely physically involved child who has minimal oral motor skills. Drinking is very difficult so that fluid intake is a major concern. Requires careful positioning and total assistance at meal time.</td>
<td>Adaptive seating equipment; must be carefully positioned for optimum results. In some instances, relaxation exercises or oral stimulation ½ hour before lunch contribute to better oral motor control at lunch.</td>
<td>Teflon-coated spoon. May require special drinking cup with “nose hole.”</td>
<td>Food requires grinding with additional liquid added for appropriate consistency.</td>
<td>Food must be carefully placed in mouth with feeder’s preferred hand. Other hand is used for jaw control in varying degrees. Milk swallowed two-three sips at a time.</td>
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</tbody>
</table>