Promoting Occupational Therapy in the Schools

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In response to our perceptions of the need to clarify the nature of school-based occupational therapy services at the local, state, and federal levels, we have written this article to address three areas. First, we suggest that the terminology used by school-based occupational therapists to describe their work be explained in terms that will allow parents and educators to better understand the roles and functions of the occupational therapist in the school. Second, to clarify and thereby increase the marketability of school-based occupational therapy, we propose a conceptual framework upon which the provision of occupational therapy as a service related to education can be based. Third, to clarify the unique role of occupational therapy in the schools, we define the roles and functions of school-based occupational therapy in such a way as to differentiate it from other related school-based services. Finally, we identify strategies to further secure the position of occupational therapy in the schools.

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Table 1 contains other examples of ways to explain general school-based occupational therapy functions in terms that are understandable by educators and parents. The examples presented in Table 1 are not meant to be a comprehensive overview of the roles and functions of school-based occupational therapy. Rather, they merely serve to show how occupational therapy concepts can be made more understandable to others. Future elaboration of school-based occupational therapy roles and functions could be based on a "field" of explanatory or teaching case examples from which principles could be both abstracted and used for dissemination (Royeen, 1988). To explain further, one way in which the roles and functions of occupational therapy in the schools could be definitively delineated is as follows: (a) compile 100 three- to five-page clinical cases that illustrate occupational therapy evaluation, intervention, and effectiveness in the school setting; (b) using expert review, abstract occupational therapy principles from the cases; and (c) elaborate a conceptual model of school-based practice based on these principles.

Conceptual Framework: Differences Between Occupational Therapy and Special Education

Special education is the dominant discipline within the special education setting. Therefore, differentiation of occupational therapy from special education may serve as a preliminary step in the specification of a conceptual framework for school-based occupational therapy.

Occupational therapy is different philosophically and theoretically from special education. One unique characteristic of occupational therapy in the schools is that it employs a developmental approach geared to sensory as well as motor development within the context of the overall maturation of the central nervous system. To illustrate, an occupational therapy goal may be to build up the underlying central nervous system foundation for the automatic function and execution of skills and the attainment of educational readiness.

The following example may further clarify the uniqueness of school-based occupational therapy. A special education teacher who uses a behavioral approach to enhance mouth closure and reduce drooling may reward the student each time he or she closes his or her mouth in response to a cue from the teacher. The occupational therapist may discover, however, through neuromuscular and functional evaluation, that the automatic functioning of the student's oral-motor musculature is not optimal and that the student's attempt at mouth closure requires too much cognitive attention, thus diverting energy needed for learning. To achieve the teacher's goal of reduced drooling, the occupational therapist may employ neuromuscular facilitation techniques based upon touch and deep pressure to the muscles of the jaw to facilitate automatic mouth closure.

Generally speaking, a school-based occupational therapist is uniquely equipped to understand and articulate to others the following: (a) the internal environment of the child, that is, whether the child's nervous system is in a condition that will permit him or her to be educated (whether educational readiness has been achieved); (b) the workings of the interactions between the child's internal environment and the demands of the external environment; and (c) the influence of the child's internal environment and of the interactions between the child's internal environment and the external environment on the child's learning readiness.

A critical difference between special education and occupational therapy is that special education is directed to teaching skills and compensating for defi-

<table>
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<th>Traditional Language</th>
<th>Revised Language</th>
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<tr>
<td>Improve gross and fine motor skills.</td>
<td>Improve motor skills necessary for interaction with the environment ranging from mobility to manipulation of objects.</td>
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<td>Improve sensorimotor integration function.</td>
<td>Improve ability to receive, process, and use sensory information to allow for more normal environmental interaction.</td>
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<tr>
<td>Prevent developmental disability, dysfunction, and deformity.</td>
<td>Promote development of motor skills, reduce effects of motor dysfunction, and prevent deformity that limits function.</td>
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<td>Improve ability in activities of daily living.</td>
<td>Improve self-care skills (feeding, dressing, grooming, and toileting) through use of adapted equipment and strategies to compensate for disability.</td>
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<td>Increase joint range of motion.</td>
<td>Increase movement at all joints to allow for better positioning during activities and rest as well as more functional use of arms, legs, and head.</td>
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<td>Increase school adjustment.</td>
<td>Increase ability to function within classroom and make adaptations necessary within the classroom to allow the child to function most efficiently and effectively.</td>
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Note: The data in this table are from "Occupational Therapy Roles and Functions in the Education of the School-Based Handicapped Student" by E. Gilfoyle and C. Hays, 1979, American Journal of Occupational Therapy, 33, pp. 565–576. Adapted by permission.
cits by drill and practice, whereas occupational therapy is directed to remediating or ameliorating underlying dysfunction or weakness, supplementing its efforts with compensation strategies if necessary. Because the occupational therapist is more often concerned with the underlying nervous system foundation of the child's educational performance and behavior, occupational therapy services are directed to the manipulation or facilitation or inhibition of components of the child's internal environment to allow for better child-environment interactions that will, in turn, facilitate learning.

Occupational Therapy Role Delineation

As a school-based service, occupational therapy is but one of several related services that EHA specifies should be available to any disabled child who needs them to benefit from special education. Thus, differentiation and explanation of the similarities and differences between occupational therapy and other services designated as related services is an important step if occupational therapy is to maintain its position in the schools. A summary of these similarities and differences is given in Table 2. Although Table 2 is not a definitive differentiation between occupational therapy and other related services, it does provide occupational therapists with a basis for identifying and clarifying these differences when talking with administrators, parents, and others involved in education about the importance of occupational therapy services in the schools.

<table>
<thead>
<tr>
<th>Discipline</th>
<th>Role and Function in the School System</th>
<th>Relationship to Occupational Therapy</th>
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<tr>
<td>Adaptive physical education</td>
<td>Concerned with sports activities and fitness of disabled children.</td>
<td>Common concern with physical activity and fitness of disabled children. Adaptive physical education teachers use more generalized strategies and group activities. Occupational therapists can prescribe individual treatment program geared to ameliorating specific dysfunction. Perceptual motor trainers and optometrists are concerned with visual-motor integration primarily related to gross motor activity. Occupational therapists are concerned with visual motor integration as related to gross and fine motor as well as sensory processing. Common concern with student's engagement in physical activity and fitness. Occupational therapists are concerned with student's other limitations that may interfere with physical education. Occupational therapists are concerned with sensory-motor processing as a substratum of intelligence, and sensory-motor processing as a substratum of the child's social/emotional/psychological state. Occupational therapists are concerned with sensory-motor processing as a substratum of intelligence, and sensory-motor processing as a substratum of the child's social/emotional/psychological state. Occupational therapists are concerned with sensory-motor processing as a substratum of intelligence, and sensory-motor processing as a substratum of the child's social/emotional/psychological state. Occupational therapists are concerned with sensory-motor processing as a substratum of intelligence, and sensory-motor processing as a substratum of the child's social/emotional/psychological state. Occupational therapists are concerned with sensory-motor processing as a substratum of intelligence, and sensory-motor processing as a substratum of the child's social/emotional/psychological state. Occupational therapists are concerned with sensory-motor processing as a substratum of intelligence, and sensory-motor processing as a substratum of the child's social/emotional/psychological state.</td>
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<tr>
<td>Perceptual motor training and optometry</td>
<td>Concerned with visual-perception and visual-motor function.</td>
<td>Common concern with motor function. Occupational therapists are concerned with motor function in relationship to engagement in occupation or activity. Occupational therapists are concerned with sensory-motor processing as a substratum of intelligence, and sensory-motor processing as a substratum of the child's social/emotional/psychological state. Common concern with oral-motor function. Occupational therapy intervention focused more on oral development as related to eating, reduction of drooling, or on motor skill to utilize adaptive communication device. Both concerned with engagement in vocational activities. Occupational therapists more involved in sensory, motor, and technological adaptation necessary to allow the individual to function most effectively.</td>
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<tr>
<td>Physical education</td>
<td>Concerned with sports activities and fitness.</td>
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<tr>
<td>Physical therapy</td>
<td>Concerned with assessing, remediating, and habilitating physical and motor dysfunction.</td>
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<tr>
<td>Psychology</td>
<td>Concerned with child's psychological and intellectual processing.</td>
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<tr>
<td>Speech pathology</td>
<td>Assesses, remediates, and habilitates speech/language and communication disorders.</td>
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<tr>
<td>Vocational education</td>
<td>Preparation for and training in vocational skills leading to employability.</td>
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Note: Some of the information in this table is from the paper "Neuroanatomical and Neuropathological Aspects of Apraxia in Adults and Children," presented by S. Cermak and L. Cermak in April 1979 at the 59th Annual Conference of the American Occupational Therapy Association in Detroit. Adapted by the authors' permission.
the current general lack of understanding of occupational therapy.

General

The effective provision of occupational therapy services in the school requires skills and knowledge that are typically acquired only after a basic occupational therapy education. Such skills and knowledge relate to understanding systems and how to affect them, understanding the educational process, understanding the effect of atypical human development on the educational process, and understanding how to be an effective advocate for occupational therapy services while remaining a team player. As Gilfoyle and Hays (1979) state, "We need to adapt our language to the teacher's needs that are within the therapist's specific area of expertise. For example, it would be important to share and discuss with the teacher topics such as assessment, behavioral analysis and management, functional independence in school, efficient realization of academic potential, compensatory strategies, and effective parental interaction.

The occupational therapy assessment should be put in an educational context for the teacher. Just listing the specific assessment technologies or evaluations used is not as beneficial as explaining their impact on educational performance and behavior. For example, explaining how a child's scattered eye tracking patterns will make it difficult for him or her to move efficiently from the teacher to the blackboard, then from the blackboard to a written page is more helpful than just indicating that eye tracking is a problem as revealed by a certain test or procedure. Identifying a constellation of low somatosensory test scores is less helpful than explaining appropriate behavioral strategies to employ with the child. For instance, it can be helpful to explain that light touch can be irritating and alarming to some children and that, in general, deep touch pressure is much more calming than light touch. Such explanations can give a teacher more insights into handling all behaviors in a classroom, not just those exhibited by children with special needs.

Other explanations that are helpful to teachers include explanations of the different modes of occupational therapy service delivery (consultation, monitoring, and direct service) and how an individual student's needs have influenced or dictated the type of service the therapist delivers.

The occupational therapist's behavioral analysis of a particular child is vital to share with the teacher. For example, by explaining some of the theoretical constructs underlying gravitational insecurity and the actions of a gravitationally insecure child, the teacher can better understand the child, his or her behavior such as avoidance of swings or difficulties in physical education, and his or her emotional state. Other explanations of classroom behaviors such as the inability to sit still, the inability to deal with transition from one task to another, and the evidencing of fatigue and sensory overload can also help.

Functional independence is a traditional occupational therapy goal. Such goals in the school would cover dressing, buttoning, tying, bathing, and eating. Additional areas related to performance in school that could be appropriate for achieving functional independence include drooling, turning book pages, handwriting, and holding pencils or scissors. By concentrating on these areas, the therapist frees the teacher to concentrate on teaching academics. (Note that with preschool children or orthopedically
impaired students, these activities of daily living may be primary educational tasks, so that the occupational therapy role might be one of consultant.)

Realization of student potential can be enhanced by communicating with the teacher. Often there is a mismatch between a child's ability and the performance expected of him or her by a teacher, particularly in classroom and playground behaviors. An occupational therapist can assist a teacher in developing realistic expectations regarding functional performance in many areas for a given child. For example, a sensory-motor evaluation can reveal if a child is physically capable of toilet training. If not, unrealistic expectations can be revised.

Compensatory strategies for specific needs is another area in which the therapist can assist the teacher. The therapist can serve as a resource regarding robotics, assistive devices, wheelchairs, etc., to meet the child's specific needs. Assistive devices or low-technology tools are traditional modalities used by therapists with children who are disabled.

Parental involvement, or home programs, can be planned in collaboration with the teacher. Such collaboration results in the teacher's better understanding what the occupational therapist does, and the therapist's better understanding the teacher's goals and objectives. Most important, parents benefit from this collaboration.

Summary

In the future, school-based occupational therapy services may be threatened because of administrators' desire to contain costs and their general lack of understanding of the services. We have proposed preliminary solutions for preventing a reduction in school-based occupational therapy services that include offering a conceptual framework for such services, differentiating the role of occupational therapy from other related services, and using strategies to promote occupational therapy that would be particularly effective with teachers.

Acknowledgments

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References


