CREATING EQUAL OPPORTUNITIES FOR CHILDREN AND YOUTH WITH DISABILITIES TO PARTICIPATE IN PHYSICAL EDUCATION AND EXTRACURRICULAR ATHLETICS



AUGUST, 2011

The U.S. Department of Education does not mandate or prescribe particular curricula or teaching strategies. The resources, information, and links cited in this document are for the readers' convenience and their inclusion herein does not constitute an endorsement by the U.S. Department of Education of any products or services cited in this document.

U.S, Department of Education

Arne Duncan *Secretary*

Office of Special Education and Rehabilitative Services (OSERS)

Alexa Posny
Assistant Secretary

Office of Special Education Programs

Melody Musgrove

Director

August 2011

This report is in the public domain. Authorization to reproduce it in whole or in part is granted. All Web sites were accessed in August 2011. While permission to reprint this publication is not necessary, the citation should be: U.S. Department of Education, Office of Special Education and Rehabilitative Services, Office of Special Education Programs, *Creating Equal Opportunities for Children and Youth with Disabilities to Participate in Physical Education and Extracurricular Athletics*, Washington, D.C., 2011.

CONTENTS

OverviewFederal Laws	
Limitations in Our Current Knowledge	5
Suggestions to Increase Opportunities	7
Accessibility	7
Equipment	8
Personnel preparation	8
Teaching style	9
Management of behavior	9
Program options	10
Curriculum	11
Assessment, Progress, Achievement, and Grading	12
Conclusion	14
Appendix A: References	15
Appendix B: An Example from State Legislation and Policy: Maryland	17
Appendix C: Resources	18
National Center on Accessibility	18
National Center on Physical Activity and Disability	18
National Consortium for Physical Education and Recreation for Individuals with Disabilities	18
The President's Challenge	18
Project UNIFY	18
Adapted Physical Education Personnel Preparation Projects funded by the U.S. Department of Education, Office of Special Education Programs	19

OVERVIEW

Physical inactivity is high among many children. In 2009, less than 25% of youth participated in at least 60 minutes of physical activity on any of the previous seven days according to the national Youth Risk Behavior Survey (U. S. Department of Health and Human Services, 2010). The President's Council on Physical Fitness and Sports Research Digest reported that physical activity is 4.5 times lower for children and youth with disabilities than their peers without disabilities (Rimmer, 2008). The patterns of inactivity in childhood and adolescence track to higher rates of inactivity, obesity, and other health problems in adulthood. Among some young people with disabilities, the lower rates of physical activity may be related to the lack of physical capacity to perform certain activities and the lack of appropriate opportunities for physical activity and athletics.

Adults with disabilities report the barriers to health and fitness "include cost of memberships, lack of transportation to fitness centers, lack of information on available and accessible facilities and programs, lack of accessible exercise equipment that can be purchased for home use, and the perception that fitness facilities are unfriendly environments for those with a disability" (Rimmer, 2008, p. 3). The feelings related to lack of access and being unwelcomed reflect a continuation of behavioral and emotional patterns begun in childhood. Typically, children and youth with disabilities engage in very little school-based physical activity, less healthy after-school activity, and more sedentary amusements (Rimmer & Rowland, 2007).

A report by the United States Government Accountability Office (GAO-10-519) revealed that, despite legislation obligating states and schools to provide equal access, opportunities for physical activity are limited for children and youth with disabilities (GAO, 2010). This

document is the initial response to the GAO recommendation that "the Secretary of Education facilitate information sharing among states and schools on ways to provide opportunities in [physical education] PE and extracurricular athletics to students with disabilities" (p. 32). The purposes of this document are to disseminate information on improving opportunities for children and youth to access PE and athletics and to refer the reader to sources of additional information regarding the inclusion of children and youth with disabilities in PE and athletic extracurricular activities. The Office for Civil Rights (OCR) in the U.S. Department of Education (Department) is providing separate and additional guidance on the legal aspects of the provision of extracurricular athletic opportunities to students with disabilities to comply with the second recommendation by the GAO to the Department in its report.

This document includes an overview of the problem, suggestions to increase opportunities for children and youth to access PE and athletics, and three appendices. Appendix A includes references from the field, Appendix B includes an example of a State law that addresses equal opportunity to access PE and athletics, and Appendix C lists projects and collaborative efforts that address physical activity among people with disabilities and includes links to Department-funded projects preparing adapted physical education personnel.

FEDERAL LAWS

States and schools are required to provide equal opportunity to participate in physical education and extracurricular athletics by children and youth with and without disabilities. The Individuals with Disabilities Education Act (IDEA) requires schools to provide a "free appropriate public education" in the "least restrictive environment." The definition of "special education" in section 602(29) of the IDEA includes instruction in physical education. Therefore, for some students with disabilities instruction in physical education may be a part of the special

education services prescribed in their individualized education program (IEP). Section 504 of the Rehabilitation Act (Section 504) and Title II of the Americans with Disabilities Act (Title II) are federal civil rights laws that prohibit disability discrimination, including in public schools. Under Section 504, schools that receive Federal financial assistance must ensure that children and youth with disabilities have an equal opportunity to participate in the program or activity of the school, including extracurricular activities. Under Title II, public entities, including public schools, may not discriminate on the basis of disability in providing their services, programs, and activities.

OCR enforces Section 504 and Title II in the context of education. OCR investigates complaints of discrimination on the basis of race, color, national origin, sex, disability, or age pursuant to these and other laws. OCR collaborates with the Office of Special Education and Rehabilitative Services in supporting improved educational opportunities for children and youth with disabilities through policy guidance, technical assistance, and information dissemination.

IDEA defines a child with a disability as a child having one of the disabilities specified in section 602(3) of the IDEA who, by reason of the disability, needs special education and related services. The following categories of disability are included in the section 602(3) of the IDEA: developmental delay (only for children under the age of 9); intellectual disability (formerly known as mental retardation); hearing impairments including deafness; speech or language impairments; visual impairments including blindness; emotional disturbance; orthopedic impairments; autism; traumatic brain injury; other health impairments; and specific learning disabilities. Identification criteria are typically developed in state regulations based on the statutory definitions of the specified disability terms in 34 CFR §300.8(c). Some children meet the identification criteria for more than one disability, (e.g. deaf-blindness or multiple

disabilities). In this document, the term "disabilities" refers to all categories of disability unless specifically noted. This inclusive meaning must inform the readers' understanding and interpretation of the document's suggestions, which are necessarily broad.¹

GUIDELINES FOR PHYSICAL ACTIVITY

The 2008 Physical Activity Guidelines for Americans (U. S. Department of Health and Human Services, 2008) recommend that children and youth have 60 minutes of physical activity of moderate and vigorous intensity daily in three types of activity—aerobic activities, musclestrengthening activities, and bone-strengthening activities. The Guidelines include a brief mention of children and youth with disabilities (p. 19):

Children and adolescents with disabilities are more likely to be inactive than those without disabilities. Youth with disabilities should work with their healthcare provider to understand the types and amounts of physical activity appropriate for them. When possible, children and adolescents with disabilities should meet the Guidelines. When young people are not able to participate in appropriate physical activities to meet the Guidelines, they should be as active as possible and avoid being inactive.

In order to reduce the risk of injury, children and youth are advised to increase their physical activity gradually and to engage in a variety of exercise, sport, and recreation activities.²

¹ Section 504 and the Americans with Disabilities Act use a different definition of disability. For purposes of this document, unless otherwise noted, the term, "disability," means the IDEA definition of disability. Although the authors of the cited works may apply different definitions of the term, "disability," the contents of these works are broadly applicable to children and youth with disabilities receiving services under IDEA.

² A variety of exercise, sport, and recreation activities promote balanced aerobic conditioning, muscle strengthening, and bone strengthening. Joints, muscle groups, and other body parts are used differently, thereby reducing the risk of injury due to repetitive motion or overuse (Foley, 2010).

Increased physical activity increases motor skills, which in turn facilitate increased physical activity (Foley, 2010).

The trend of childhood obesity and inactivity is increasing the focus on physical activity among children (e.g. The First Lady's *Let's Move*! campaign--information available at http://www.letsmove.gov/). Not only are inactivity and obesity even more prevalent among children with disabilities (Rimmer, 2008), inactivity and obesity can be more problematic for children and youth with disabilities because they can lead to and exacerbate secondary conditions associated with certain disabilities (Rimmer, Wang, Yamaki, & Davis, 2010).

LIMITATIONS IN OUR CURRENT KNOWLEDGE

There is limited understanding of how the research on children without disabilities can be translated into guidance for physical activity programs for children with disabilities (Fleming, 2010). In spite of the public's awareness of the risks of inactivity and obesity, there is limited research providing evidence of effective practices and approaches to increase physical activity, to reduce obesity, and to maintain health among children and youth with disabilities. The few findings of the research done in clinical settings have not been adequately translated for application to PE and athletic activities in school and community settings. As a result of the limited research in this area, states, schools, and educators are faced with the challenge of developing and implementing practices to increase the participation of children and youth with disabilities in PE and athletics without a strong base of research evidence.

Even with the limited research on effective practices, there is growing consensus in the research literature regarding several common barriers to physical activity for children and youth with disabilities. The barriers include inaccessible facilities and equipment (Auxter, Pyfer,

Zittel, & Roth, 2010; Block, 2007; Rimmer, 2008; Rimmer & Rowland, 2007; Simeonsson, Carlson, Huntington, McMillen, & Brent, 2001; and Stanish, 2010); personnel without adequate training (Auxter, et al., 2010; Block, 2007; Rimmer & Rowland, 2007; and Stanish, 2010); and inadequate, non-compliant, or otherwise inaccessible programs and curricula (Auxter, et al., 2010; Block, 2007; Porretta, 2010; Rimmer, 2008; Rimmer & Rowland, 2007; Simeonsson, et al., 2001; and Stanish, 2010). The research base and professional opinion support the following suggestions for improving opportunities for children and youth with disabilities to participate in PE and athletic activity.

SUGGESTIONS TO INCREASE OPPORTUNITIES

States and school districts can increase opportunities for participation by reducing or eliminating common barriers to participation. In this section, we address common barriers and provide suggestions for increasing access.

ACCESSIBILITY

Accessibility includes the considerations of the area or environment in which physical activity takes place, the safety and security within the space, and specifications suggested for particular disabilities. Access is facilitated through adapted PE practices³ and universal design principles⁴ (U. S. Access Board, n.d.). For example, concrete play areas are being replaced by soft surfaces to reduce child injury. Because wood chips and sand interfere with mobility of children and youth in wheelchairs, solid soft surfaces are recommended to allow safe use of play areas by more children and youth (U. S. Access Board, n.d.).

The Title II regulations, which apply to public schools and their facilities, provide requirements for accessibility to persons with disabilities.⁵ For example, Title II applies to public schools' play areas and provides requirements for their accessibility by persons with

³ "Adapted Physical Education is physical education which has been adapted or modified, so that it is as appropriate for the person with a disability as it is for a person without a disability." (Adapted Physical Education National Standards at http://www.apens.org/whatisape.html)

⁴ "The term, 'universal design,' means a concept or philosophy for designing and delivering products and services that are usable by people with the widest possible range of functional capabilities, which include products and services that are directly accessible (without requiring assistive technologies) and products and services that are interoperable with assistive technologies." (See Assistive Technology Act of 1998, as amended, 29 U. S. C. § 3002. IDEA uses the same definition. See 20 U.S.C. § 1401(35).)

⁵ Among other things, the Title II regulations provide that new construction of a facility be done so that the facility is readily accessible to and usable by persons with disabilities. New construction and alterations commencing on or after March 15, 2012, are subject to new design standards under the Title II regulations, and these standards include specific requirements for play areas. See 28 C.F.R. §35.151. The Title II regulations also impose a requirement that each service, program or activity of a public entity, when viewed in its entirety, is readily accessible to and usable by persons with disabilities, and they establish program accessibility requirements that include requirements applicable to play areas. See 28 C.F.R. §35.150.

disabilities. Accessibility also refers to the opportunity to use facilities and equipment.

Communities that provide accessible transportation to accessible facilities increase the opportunity for physical activity by children and youth with disabilities and their families.

EQUIPMENT

Appropriate equipment can help children and youth with disabilities participate in appropriate physical activity. Athletic equipment might need to be modified for safe use by some children and youth with disabilities. For other students with disabilities, specialized equipment may be needed. Activities involving the use of modified or specialized equipment can replace other less safe activities. Treadmills, for example, are effective in providing predictable walking and running conditions, which can be necessary and appropriate for some individuals with disabilities (Stanish, 2010). As another example, gaming systems that support movement detection technologies (e.g., Wii, Xbox 360, and PlayStation 3) can be used by some children and youth with disabilities to participate in sport simulations (Foley, 2010). Physical growth and development and changes in ability require continuous reevaluation and, as needed, modification of the fit and functionality of equipment for children and youth with disabilities.

PERSONNEL PREPARATION

Knowledgeable adults create the possibility of participation among children and youth both with and without disabilities. Physical activities may be guided by a wide range of support personnel with various levels of training including other students, general and special education teachers, paraprofessionals, adaptive physical education specialists, and related service providers (e.g., occupational therapist or speech language pathologist). Appropriate personnel preparation and professional development to adapt games and activities to various ability and fitness levels are needed in order to increase opportunities for children and youth with disabilities.

TEACHING STYLE

Inclusive teaching styles create a climate and culture of participation for children and youth with and without disabilities. The educational philosophy and beliefs of the individual teacher and the school system influence opportunity. Patterns of teaching must be informed by the need to safeguard the civil rights of all students, including those with disabilities, both by providing equal athletic opportunity and protecting students from reasonably foreseeable risks to their health and safety. In PE and athletic programs, the focus has traditionally been on competition rather than instruction, but has recently shifted to "new PE," which focuses on improvements by the individual student. Children and youth with disabilities and those without athletic prowess require adaptive opportunities and precise instruction for concerns such as poor motor coordination (Stanish, 2010).

MANAGEMENT OF BEHAVIOR

Athletics in the school setting involve complex interactions in settings less controlled than the typical academic classroom. Team play and sportsmanship cannot be taught except through participation. Effective PE and athletics require a teacher or coach with strong behavior management skills. Certain disabilities are associated with characteristics that may interfere with the student's ability to act consistently like a good team player or otherwise conform to the social expectations of particular athletic activities. A few of these characteristics include poor impulse control, limited social awareness, and emotional lability. School personnel should have the knowledge, skills, and abilities to address the interactional components of disabilities within the context of competition. Children and youth with and without disabilities can participate in PE

-

⁶ "Emotional lability is a condition of excessive emotional reactions and frequent mood changes." (Mosby's Medical Dictionary, 8th edition, 2009)

and athletics more fully when social, emotional, and behavioral interactions are directly instructed, monitored, and remediated.

PROGRAM OPTIONS

PE and athletics can be offered in various degrees of inclusion in programs and activities with children and youth without disabilities. IDEA requires that each child with a disability participates with nondisabled children in these programs and activities to the maximum extent appropriate to the needs of that child.⁷ Physical education services, specially designed if necessary, must be made available to every child with a disability receiving a free appropriate public education, unless the public agency enrolls children without disabilities and does not provide physical education to children without disabilities in the same grades.⁸ Each public agency must take steps to provide nonacademic and extracurricular services and activities, including athletics, in the manner necessary to afford children with disabilities an equal opportunity for participation in those services and activities.⁹ For students served under IDEA, the student's IEP must include, among other things, a statement of the special education and related services, and supplementary aids, services, and other supports that are needed to meet each child's unique needs in order for the child to: (1) advance appropriately towards attaining the annual goals; (2) be involved in and make progress in the general education curriculum and to participate in extracurricular and other nonacademic activities; and (3) be educated and

_

⁷ The IDEA Part B regulations in 34 CFR §300.117 require that the public agency ensure that each child with a disability has the supplementary aids and services determined by the child's IEP team to be appropriate and necessary for the child to participate in nonacademic settings.

⁸ The IDEA Part B regulations in 34 CFR §300.108(b) require that each child with a disability must be afforded the opportunity to participate in the regular physical education program available to nondisabled children unless the child is enrolled full time in a separate facility; or the child needs specially designed physical education, as prescribed in the child's IEP. The regulations in 34 CFR §300.108(d) require the public agency responsible for the education of a child with a disability who is enrolled in a separate facility to ensure that the child receives appropriate physical education services.

⁹ The IDEA Part B regulations in 34 CFR §300.107 address nonacademic and extracurricular services and activities.

participate in such activities with other children with disabilities and nondisabled children.¹⁰ The IEP team, which includes both general and special education teachers, might benefit from participation by a general or adaptive physical education teacher in order to develop the IEP for certain students. Section 504 and Title II also reflect the principle of inclusion in their mandate of equal access and require that students with disabilities are served in the most integrated setting appropriate to their needs.

CURRICULUM

Curriculum encompasses more than the age or grade lists of content standards, benchmarks, objectives, strategies, and assessments. Curriculum includes day-to-day implementation, which requires flexibility with the content in context. An accessible PE curriculum provides for that flexibility. Applying the universal design for learning (UDL)¹¹ framework to the PE curriculum increases opportunities for participation by providing multiple means for student engagement. The variety of options allows children with disabilities to choose activities of interest which increases their participation (Porretta, 2010). UDL also provides multiple means of presentation. Information technology shows promise in providing a new means of presentation. For example, "bug-in-the-ear" communicators allow sideline coaches and instructors to personalize the "real-time" explanation of game rules and procedures based on the needs of individual players with disabilities (Rimmer & Rowland, 2008).

¹⁰ The IDEA Part B regulations in 34 CFR §300.320 (a) address the content required in a child's IEP and §300.320(a)(4) requires a statement of the special education and related services and supplementary aids and services and other supports to be provided to the child.

¹¹ "The term "universal design for learning" means a scientifically valid framework for guiding educational practice that— (A) provides flexibility in the ways information is presented, in the ways students respond or demonstrate knowledge and skills, and in the ways students are engaged; and (B) reduces barriers in instruction, provides appropriate accommodations, supports, and challenges, and maintains high achievement expectations for all students, including students with disabilities and students who are limited English proficient." (Higher Education Resources and Student Assistance, 20 U.S. C. § 1003)

PE curricula based on physical growth and the development of fitness and socialization can support the inclusion of children and youth with disabilities. The curricular focus on lifelong fitness and health can facilitate forming habits that will follow through to adulthood (Foley, 2010). Teachers and coaches increase successful inclusion by focusing on the camaraderie and fun of activity rather than on competition and winning.

An individual student's IEP must include goals and accommodations for PE and athletics, as needed (IDEA, 20 U. S. C. §1414(d)). The development of IEPs requires collaboration among professionals as well as parent participation. Parents might be reluctant to have their children participate in physical activity due to uncertainty about its effects and the possibility of teasing and ridicule from peers. The IEP team can better support the students' successful access to, and participation in, PE and athletics when these concerns are effectively addressed in the IEP.

ASSESSMENT, PROGRESS, ACHIEVEMENT, AND GRADING

Assessment in PE and athletics should be planned and implemented so that progress and achievement can be rated accurately and fairly. Assessment instruments that compare the individual against herself or himself are able to measure both attainment and growth. These comparisons show the trajectory toward health and fitness, while avoiding the inappropriate application of some standardized benchmarks of health and fitness to children and youth with disabilities. For example, Body Mass Index has been shown to be inappropriate for people with certain disabilities who tend to have a different proportion of lean mass (Rimmer, et al., 2010). Some equipment and technologies may allow for more accurate assessments of the incremental improvements made by children and youth with disabilities. For instance, wheelchair scales increase the accurate measurement of a student's weight and a spreadsheet can track the changes.

Better assessment can lead to better instruction, feedback, grading practices, and ultimately better outcomes for children and youth with disabilities.

When competitive performance is the sole or primary criterion for grades in PE classes, some children and youth with and without disabilities might earn failing grades. The methods used to grade progress and achievement can be used to encourage participation among children and youth with disabilities. For an individual child whose IEP includes annual goals for PE and athletics, the IEP must include a description of how a child's progress towards meeting the annual goals will be measured.

CONCLUSION

The purpose of this document is to disseminate information on improving opportunities for children and youth to access PE and athletics. This document is the Department's initial response to GAO's recommendation, referring the reader to sources of additional information regarding the inclusion of children and youth with disabilities in PE and athletic extracurricular activities. Research and professional opinion support the suggestions for improving opportunities for children and youth with disabilities to participate in PE and athletic activity by addressing common barriers to increase access and participation.

States and school districts can increase opportunities for participation by reducing or eliminating common barriers to participation. The Appendices that follow provide references, examples and resources for increasing equal opportunities for children and youth with disabilities to participate in PE and athletics. The example from Maryland in Appendix B describes the only current state legislation addressing equal opportunity to access PE and athletics. The resources in Appendix C include projects and collaborative efforts that address physical activity among people with disabilities. Links to Department-funded projects preparing adapted physical education personnel are also provided in Appendix C.

APPENDIX A: REFERENCES

- Auxter, D., Pyfer, J., Zittel, L., & Roth, K. (2010). *Principles and Methods of Adapted Physical Education and Recreation* (11th ed.). Boston: McGraw-Hill.
- Block, M. E. (2007). A Teacher's Guide to Including Students with Disabilities in General *Physical Education* (3rd ed.). Baltimore, MD: Brookes Publishing.
- Fleming, R. (2010, July 15). Translating general pediatric weight loss interventions for application with children with intellectual and developmental disabilities. Presentation at *Obesity in Children with Developmental and/or Physical Disabilities* meeting sponsored by the Eunice Kennedy Shriver National Institute of Child Health and Human Development (NICHD). Bethesda, MD.
- Foley, J. (2010, July 15). Physical activity—Physical disabilities. Presentation at *Obesity in Children with Developmental and/or Physical Disabilities* meeting sponsored by the Eunice Kennedy Shriver National Institute of Child Health and Human Development (NICHD). Bethesda, MD.
- Porretta, D. (2010, July 15). Physical activity—Intellectual and developmental disabilities.

 Presentation at *Obesity in Children with Developmental and/or Physical Disabilities*meeting sponsored by the Eunice Kennedy Shriver National Institute of Child Health and Human Development (NICHD). Bethesda, MD.
- Rimmer, J. (2008, June/July). Promoting inclusive physical activity communities for people with disabilities. *President's Council on Physical Fitness and Sports Research Digest*, 9(2), 1-8.
- Rimmer, J., & Rowland, J. L. (2007). Physical activity for youth with disabilities: A critical need in an underserved population. *Developmental Rehabilitation*, 11(2), 141-148. doi: 10.1080/17518420701688649
- Rimmer, J., Wang, E., Yamaki, K., & David, B. (2010). Documenting disparities in obesity and disability. *FOCUS* Technical Brief #24. Austin, TX: SEDL.

- Simeonsson, R. J., Carlson, D., Huntington, G. S., McMillen, J. S., & Brent, J. L. (2001). Students with disabilities: A national survey of participation in school activities. *Disability and rehabilitation*, 23(2), 49-63.
- Stanish, H. (2010, July 15). Physical activity—Intellectual and developmental disabilities.

 Presentation at *Obesity in Children with Developmental and/or Physical Disabilities*meeting sponsored by the Eunice Kennedy Shriver National Institute of Child Health and Human Development (NICHD). Bethesda, MD.
- U. S. Access Board. (n.d.). Accessibility guidelines for play areas: An overview. Retrieved from www.access-board.gov/play.
- U. S. Department of Health and Human Services (HHS). (2010). *Trends in the Prevalence of Physical Activity: National YRBS: 1991 2009*. Available at http://www.cdc.gov/HealthyYouth/yrbs/pdf/us_physical_trend_yrbs.pdf.
- U. S. Department of Health and Human Services (HHS). (2008). 2008 Physical Activity Guidelines for Americans: Be Active, Healthy, and Happy! ODPHP Publication No. U0036. Washington, D.C.: Author. Available at www.health.gov/paguidelines/pdf/paguide.pdf.
- U. S. Government Accountability Office (GAO). (2010, June). Students with Disabilities: More Information and Guidance Could Improve Opportunities in Physical Education and Athletics. Report to Congressional Requesters Number GAO-10-519. Washington, DC: Author. Available at www.gao.gov/products/GAO-10-519.

APPENDIX B: AN EXAMPLE FROM STATE LEGISLATION AND POLICY: MARYLAND

2008 Maryland Fitness and Athletic Equity Act for Students with Disabilities

The Maryland law, unique in the nation and in full effect July 2011, requires local boards of education to develop policies to include students with disabilities in all curricular and extracurricular physical education and athletic programs. Specifically, the schools must provide students with reasonable accommodations to participate, the opportunity to try out for school teams, and access to alternative sports programs.

A Guide for Serving Students with Disabilities in Physical Education

www.marylandpublicschools.org/NR/rdonlyres/84C4C717-B8FF-486B-8659-79F297DF5B38/19715/Servingstudents2.pdf

The Maryland State Department of Education published this guide for schools to comply with the 2008 Maryland Fitness and Athletic Equity Act for Students with Disabilities.¹²

_

¹² As previously stated on page ii, the resources, information, and links cited in this document are for the readers' convenience and their inclusion herein does not constitute an endorsement by the U.S. Department of Education of any products or services.

APPENDIX C: RESOURCES

National Center on Accessibility

www.ncaonline.org

This center is supported through a cooperative agreement with the National Parks Service. It promotes access and inclusion for people with disabilities to parks, recreation, and tourism. The center promotes personal wellness and community health.

National Center on Physical Activity and Disability

www.ncpad.org

NCPAD is supported by the Centers for Disease Control and Prevention (CDC). It is an information center concerned with physical activity and disability. The center provides an online source for information about people of all ages with disabilities, including Web pages that list resources by categories.

National Consortium for Physical Education and Recreation for Individuals with Disabilities

www.ncperid.org

NCPERID promotes research, professional preparation, service delivery, and advocacy of physical education and recreation for individuals with disabilities.

The President's Challenge

www.presidentschallenge.org/participate/ed-disabilities.shtml

The President's Challenge to increase physical fitness is made to all children, youth, and adults of all ages and abilities. Detailed information about the challenge and resources to support individuals and school or community groups in meeting the challenge are made available through the President's Council on Fitness, Sports & Nutrition.

Project UNIFY

www.specialolympics.org/projectunify.aspx

The Special Olympics' Project UNIFY is supported by the Office of Special Education Programs (OSEP). It is a K-12 intervention that strategically activates youth, engages educators and promotes communities of acceptance and inclusion where all young people are agents of change—fostering respect and dignity for people with Intellectual Disabilities (ID), utilizing the sports and education initiatives of Special Olympics.

ADAPTED PHYSICAL EDUCATION PERSONNEL PREPARATION PROJECTS FUNDED BY THE U.S. DEPARTMENT OF EDUCATION, OFFICE OF SPECIAL EDUCATION PROGRAMS

Adapted Physical Education Training of U. S. Pacific Islanders Using a Teacher-Consultant Model (Project APERT), University of Hawaii

Nathan Murata, Ph.D.

nmurata@hawaii.edu

Center on Health and Adapted Physical Education, University of Wisconsin-La Crosse Garth Tymeson, Ph.D.

tymeson.gart@uwlax.edu

Personnel Preparation of Highly Qualified Adapted Physical Education Teachers in Pennsylvania, Slippery Rock University of Pennsylvania

Robert Arnhold, Ph.D.

Robert.arnhold@sru.edu

Preparation of Fully Credentialed, Highly Qualified Adapted Physical Educators at the Masters Level for Students with Low Incidence Disabilities, Texas Women's University

Ronald French, Ph.D.

rfrench@mail.twu.edu

Preparation of Leadership Personnel in Adapted Physical Education, Oregon State University Jeffrey McCubbin, Ph.D.

jeff.mccubbin@oregonstate.edu

Project ADAPTED PE, University of Utah

Hester Henderson, Ph.D.

hester.henderson@health.utah.edu

Project for Preparing Adapted Physical Education, Western Michigan University

Debra Berkey, Ph.D.

debra.berkey@wmich.edu

Project P. P. A. P. E.: Professional Preparation of Adapted Physical Education, North Carolina Agricultural and Technical State University

Gloria Palma, Ph.D.

palmag@ncat.edu

Using a Hybrid Online Master's Degree Program to Train Qualified Adapted Physical Education Teachers, Western Michigan University

Jiabei Zhang, Ed.D.

zhangj@wmich.edu

