

QUICK GUIDE

February 2018

ASSISTIVE TECHNOLOGY ASSESSMENTS AFTER EPILEPSY SURGERY



Most of us use some form of assistive technology in our lives, whether a pair of reading glasses, a navigation application on a smartphone, or a can opener. For people with disabilities, assistive technologies are assistive, adaptive, and rehabilitative devices that are used to help them with activities of daily living (such as toileting, walking, eating, and dressing) or can help them access their work environment or educational curriculum at school.

After epilepsy surgery, children may have difficulties performing some activities of daily living on their own or even with assistance, and assistive technologies can minimize the effects of the child's disabilities, making it easier for the child to accomplish various tasks at home, in school, and in the community.

For example, a wheelchair is an assistive technology that provides independent mobility for a

child who cannot walk. Assistive technologies can be something as simple as a magnifying glass or pencil grip, or as complicated as eye-gaze activated computer software.

HOW DOES ASSISTIVE TECHNOLOGY HELP A CHILD IN SCHOOL?

Assistive technology helps the child access the curriculum and educational setting. This increases the child's opportunities for education, social interactions, and potential for meaningful employment. It also supports a student's participation in learning experiences in the least restrictive environment.

HOW DOES A SCHOOL TEAM DETERMINE WHAT ASSISTIVE TECHNOLOGY IS APPROPRIATE FOR A CHILD AFTER EPILEPSY SURGERY?

An assistive technology assessment reviews the need for any low-tech to high-tech devices or services needed for the child to benefit from education, including the use of such devices in the student's home¹ or in other settings.² The assessment serves to identify ways to minimize the academic demands on the child by using tools and supports that free up the child's physical and cognitive resources for learning.

DOES THE LAW REQUIRE THE IEP TEAM TO CONSIDER ASSISTIVE TECHNOLOGY?

Yes. During the IEP process, assistive technology must be considered for every child and then provided by the district if required in a child's IEP to access a free and appropriate public education. As defined in the Individuals with Disabilities Education Act, an assistive technology device means any item, piece of equipment, or product system, whether acquired commercially off the shelf, modified, or customized, that is used to increase, maintain, or improve the functional capabilities of a child with a disability.³ An assistive technology service means any service that directly assists a child with a disability in the selection, acquisition, or use of an assistive technology device.⁴

WHO SHOULD BE PART OF THE AT ASSESSMENT TEAM?

Children after epilepsy surgery should receive an AT assessment with a **vision specialist**, **physical therapist**, and **occupational therapist** present during the evaluation.

The **vision specialist** is especially important after surgeries which disconnect or remove the occipital lobe, such as hemispherectomy, TPO disconnection, or occipital lobectomy, and ensures that the assessment considers the significant visual field loss (complete, dense homonymous hemianopia) as a result of the surgery. (Please see our separate guide: "*Vision After Hemispherectomy, TPO Disconnection and Other Surgeries Which Remove or Disconnect the Occipital Lobe*").

In addition, children after hemispherectomy, TPO disconnection, and occipital lobectomy, have **oculomotor issues** that can significantly affect reading, and may have visual perceptual deficits that affect learning mathematics or any other activity that requires visual-spatial and

visual-motor skills. Other epilepsy surgeries may cause oculomotor challenges as well. The assistive technology assessment should consider these oculomotor issues throughout the evaluation.

Some assistive technology considerations for this vision impairment include (but are not limited to):

- A **stand/mount** to position equipment in optimal visual field (such as a slant board);
- **Electronic reading aids with gliding text** magnify text from a book or magazine onto a computer screen. This allows the reader to view the words in larger print against a bright background and provide a clear and bright landing spot for the child's eyes (often a challenge for a child with oculomotor control issues). Examples of electronic reading aids include:
 - Voice Dream Reader
 - EzRead Electronic Reading Aid
 - Carson E-ZRead Digital Magnifier
 - Reizen Electronic Reading Aid
- **Boundary marking devices** such as translucent plastic with a bright red boundary line, can help the child scan to the next line of text;
- **Reading highlighter strips;**
- **Additional lighting.**

An **occupational therapist** and **physical therapist** should also be consulted when exploring assistive technology tools so that the child's motor deficits are considered. Children with hemiparesis after epilepsy surgery will only have one hand to use to manipulate and manage any assistive device. How is the student going to access their AT tools in multiple classrooms, seated at different desks? The evaluation should include a plan to have the child carry equipment from place to place and set it up independently in each classroom (or provide support staff to help manage the AT equipment).

WHERE SHOULD THE CHILD BE ASSESSED?

The child should be assessed in a quiet room without interruption. Many children who have had epilepsy surgery struggle with attention issues. A quiet room without visual and auditory distractions helps ensure that the child's attention is focused on the assessment. Because some surgeries like hemispherectomy, TPO disconnection, and any other procedure which removes or disconnects one temporal lobe (which contains the **auditory centers of the brain**), children post-surgically are often unable to processing of sounds and words properly in noisy environments (please see our separate guide "Cortical Auditory Processing After Hemispherectomy" for more information).

WHAT SHOULD THE FINAL ASSESSMENT EVALUATION INCLUDE?

A good assistive technology evaluation should include:

- For assistive technologies currently in use, a determination of whether the technology is **working properly**
- **Training recommendations and plan** for staff, aides, parent, and student

- **Product adaptation** if necessary
- Identification of **new devices**
- **Implementation plan**
- New technology “**cheat sheets**” for the school team, including aides, to use until they are all familiar with the AT
- **Recommendations for AT goals** that align with IEP goals
- Recommendations for **explicit instruction** for the student and guided practice until the child is proficient

COMMON CHALLENGES FACED BY A CHILD AFTER LARGE RESECTIVE OR DISCONNECTIVE EPILEPSY SURGERIES

Although every child is unique, there are some common challenges faced by a child after large resective or disconnective epilepsy surgeries include:

- Difficulty with the **mechanics of writing** (using pencil & paper) and motor aspects of handwriting and note-taking
- **Hearing and/or vision impairment**
 - central auditory processing disorder, hyperacusis
 - homonymous hemianopsia
 - quadrantanopia
 - visual processing and visual tracking issues
- Difficulty with **reading and/or writing** (language-based learning disability)
 - spelling
 - **reading fluency** (speed, accuracy, automaticity)
 - critical thinking (making connections, drawing inferences)
- Specific challenges with **math**
- Daily **organization** challenges
 - executive function disorder
 - attention/focus (ADHD)
- Communication/social interactions, including **pragmatics of conversation**
- Cognitive processing
 - retention of information (working memory) and **cognitive overload**
 - **stamina** to accomplish tasks
 - rate at which a task is accomplished
- **Gross motor**
 - mobility
 - recreation/sports
 - seating/positioning
 - self-care/activities of daily living including self-feeding
 - levels of independence
- **Sensory issues**

Some tools that are useful for students who have undergone epilepsy-related brain surgery:

- A Macbook air or similar computer with accessibility features to aid with writing, organizing work, and access to educational apps. The **lightweight** nature of this computer make it manageable for one-handed use;
- **An iPad or tablet** with built-in accessibility features for modified writing modality to access needed educational apps, and the ability to enlarge the view of needed materials

(with Otterbox defender case and protective screen cover to prevent glare) and used with slant board, mount or stand to place computer/iPad at optimal viewing for the child with visual field loss;

- Alternative **keyboard for one-handed use** (smaller keyboard for finger reach, bluetooth enabled);
- **Keeble** – accessible e-keyboard with color change options for the iPad;
- **G-board** (Google app for glide typing);
- **Weighted pencil/marker** or weighted, thick stylus helps allow better grip and builds motor memory for transferring to pencil & paper writing (consult with occupational therapist to trial different weights/thickness to find the correct aid for handwriting);
- Cosmonaut Weighted Stylus for iOS;
- Computer or iPad **overlays for eye fatigue** (glare), glare reducing glasses serve similar purpose for extended screen time;
- **LiveScribe Smartpen** - At the middle-to-high school level there is generally a significant amount of note taking. This enables a peer note taker to 'share' their notes via the smartpen, as well as record audio notes of the lectures;
- A **reader pen** such as Equil SmartPen, Scanmarker Air, ExamWriter;
- **Video magnifier/camera** to enlarge text font;
- Allow student to **photograph teacher's whiteboard** with camera with iPad then edit on device;
- **Screen-sharing app** (like Joinme, Zoom, or VNC Viewer);
- **Noise canceling** headset and microphone;
- Tools to aid staying **focused**: vibrating alarm, assistive listening device (increase foreground-to-background ratio).

Apps/software (examples):

- **Cloud computing** and ease of access to receiving/sending assignments to the teacher; e.g. Google drive, docs, sheets, classroom;
- Canvas by Instructure;
- Adobe Form and Fill;
- **Note-taking apps** such as Notability (to upload/import files as screenshots) or Evernote (can greatly increase productivity);
- **Scanner apps**:
 - Jot Note scanner: The scanner app will take a picture of a document or "scan" it into the iPad, then it can be sent to the Notability app for completion. This allows any worksheet to be resized right on the iPad for enlarging, color-coding, color highlighting, etc.
 - Prizmo
 - Tiny Scanner
 - Genius Scan
- **One-handed typing programs**;
- **Voice recognition software** for written dictation (also available in Google Docs and other apps);
- **Voice recorders** allow the student to record the teacher's lecture/instruction as a backup when taking notes in class;
- **CoWriter** allows high visual contrast, word prediction, word completion, saving work, sharing;
- **VoiceDream** reader and writer - smoothly synchronizes text into speech;
- **ClaroPDF Pro** is an accessible, reading and study PDF tool for all. Annotate, mark up and save PDF files, have accessible text PDF files read back to you with a human quality voice & synchronised highlighting;

- **Solo Suite Software** provides numerous programs to help students with learning differences in the area of reading and writing, including text to speech and word prediction;
- **Writing software** (grammar, punctuation and spell checking) such as Inspiration software or Google Classroom's Ginger extension;
- **Learn To Write** for practice in letter formation and spacing;
- **Snap Type** allows alternative to handwriting, helps allow student to keep up with class pace, can take picture of classroom worksheets and fields are easily inserted into the worksheet;
- **Write My Name** allows for writing with finger or stylus;
- **Symbol supported writing software:**
 - Crick Software www.cricksoft.com
 - Pix Writer – www.slatersoftware.com
 - Writing with Symbols · www.wigit.com
- **Read Screen** (which reads aloud what is on the screen for times when the student is fatigued);
- **Audio books/textbooks**, especially software that 'spotlights' text as it is read (helps with both attention issues and eye jumps):
 - Bookshare.org: available for low vision students. Student should qualify for a free account on Bookshare due to visual impairment (certified print disability). Many textbooks and other instructional materials are available with organizational, school, and individual memberships, and is free to U.S. students with qualifying disability. Includes free book playing software that reads the text out loud.
 - Learning Ally can be preferable because they use human readers, and student can follow the text while listening. Can be used with Voice Dream Reader software. Annual subscription, scholarships available for qualifying individuals.
 - Free online book sources:
 - BooksShouldBeFree.com
 - Project Gutenberg – www.gutenberg.net – Over 27,000 free e-books
 - Online Open Library – <http://openlibrary.org> – Over one million books with full text – Scanned full text available online or some as downloadable PDF
 - NetLibrary – www.netlibrary.org – Over 170,000 materials – online or downloadable – accessibility features – audiobooks to loan
 - Public Libraries
 - Audio Books Online For Purchase:
 - Audible: www.audible.com – Over 50,000 titles – Several membership plans available – downloaded then transferred to device ·
 - Amazon: www.amazon.com
 - iTunes – Audiobooks, Podcasts, iTunes U (free university lectures & more)
- Devices for playing **ebooks**: Kindle; Classmate Reader; iPad;
- **Panther Math Paper** is useful for longer math assignments when legibility can become an issue. Although the student may demonstrate proficiency with math concepts, they can have difficulty with traditionally writing out problems and lining up the numbers and columns, which can result in errors with calculations;
- **Story Math Facts** (for elementary age);
- **Study skills apps** (such as www.linguisystems.com and www.brooklinebooks.com);
- **Outlining and mapping software** to help organize writing, notes, instructions, checklists, concepts (any information that benefits from a structure), such as such as Inspiration, Kidspiration, Webspiration, XMind, Mindmanager, Freemind;
- **Digital graphic organizers** such as “First, Then” visual schedule (FTVS), myHomework Student Planner, My Video Schedule, Goalbook, Corkulous, Nudge, Remember the Milk;

- **Self monitoring tools** such as the app WatchMinder, Time Timer, or a vibrating wristband for reminders/cues; online prioritized organizational systems with reminders;
- **Digital flashcards**, i.e. Quizlet.com;
- Pre-teaching vocabulary with **apps that have vocabulary practice**;
- **Dexterity app** (iPad) for fine motor development;
- **Word banks/phrase banks**;
- **Electronic references** such as dictionaries, thesauruses, encyclopedias;
- Video supports, how-to diagrams, and animated illustrations;
- **Beeline reader** for ease of reading web pages;
- **iAnnotate**: read, mark-up, and share PDF, DOC, PPT and image files;
- **iStudent** (high school and up): Overview of classes and assignments every day;
- **CourseNotes** (high school and up): Study guides for 20+ subjects, free notes, outlines, vocabulary terms, study guides, practice exams, etc. to help high school students with their homework; allows you to take notes during class organized by subject or meeting, keep a To-Do list, or track assignments with a due date.

Low and lower-tech solutions:

- **Communication**
 - Schedule charts
 - communication overlays
 - communication books
- **Writing**
 - Name stamp if the child has difficulty writing their name
 - Pencil grips, large barrel, adapted, or weighted pens & pencils, varied pencil & pen thickness/size
 - Boundary marking device
 - Extra room on worksheets, enlarged worksheets, fewer problems on a page
 - Larger space to do work
 - Raised line paper
 - Slant board to allow all desktop work to be at the appropriate angle both for the visual impairment and for ease of writing/ergonomic support
 - Clips with Velcro to hold paper in place
 - Writing templates
 - Checklists for writing process
 - Graphic organizers
 - White board with dry erase markers
 - Book stand to place books in optimal viewing position
- **Reading**
 - Colored overlays
 - Colored reading guides
 - Highlighter tape
 - Hand held magnifier
- **Math**
 - Multiplication chart
 - Calculator
- **Sensory aids**
 - Weighted blankets & vests
 - Squeeze balls
 - Rubber band bracelets
 - Chew tubes

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- Textural toys
 - Vibrating toys and objects
 - Therapy balls and discs for sitting
 - **Posture**
 - Reminders (i.e. visual guide) to keep posture upright
 - Wedge for seating
 - **Feeding**
 - Easy Hold grips
 - EzPz Happy Mat and Happy Bowl
 - KFS Easy Eat utensil
 - Scooper bowl with suction base
 - Stainless steel or plastic food guards
 - Posey grip non-slip matting
 - Sticky bowl
 - Skidrol scooper bowl with non-slip base
 - GripWare scoop dish

FOR MORE INFORMATION

The following resources have more information about assistive technologies for children with disabilities.

Amazon www.amazon.com

Enter “one handed” into the search window, and Amazon will pull page after page of devices for one-handed use, from simple solutions like soft pull perforated paper towels and toilet paper to high-tech devices like one-handed keyboards.

One-Handed In A Two Handed World by Tommye Karen Meyer

Following a stroke at age 23, the author developed a system for how to accomplish a wide range of everyday activities of daily living one-handedly — dressing, eating, cooking, doing household chores, traveling, and much more.

One Hand Can www.onehandcan.com

Website which includes cooking and other tips for people who have use of only one hand.

Teaching Students With Visual Impairments www.teachingvisuallyimpaired.com

This website contains substantial information about teaching students with visual impairments, including a robust section on assistive technologies such as non-optical low vision devices, low/med tech tactual devices, optical devices for near vision, optical devices for distance vision, video magnifiers, screen enlargement and readers, braille technology, tactile graphics technology, and auditory access.

National Assistive Technology Research Institute www.natri.uky.edu

NATRI conducts research related to the planning, development, implementation, and evaluation of assistive technology (AT) services in school, identifies promising practices in the delivery of AT services, and disseminates research findings and information about promising practices in ways that will assist school personnel to develop or improve AT policies and practices for students with disabilities.

The NATRI website includes substantial information about individual education plans and assistive technologies, including an **assistive technology planner** for teachers, families, and administrators at <http://natri.uky.edu/atPlannermenu.html>.

Technology and Media Division (TAM) www.tamcec.org

Technology and Media Division (TAM) is the official division of the Council for Exceptional Children that works to promote the availability and effective use of technology and media for individuals with exceptional learning needs. Anyone who uses technology as one of the options to improve outcomes for children and adults with disabilities is welcome to join TAM. Tam members work in classrooms, centers, clinics, homes, and universities. They include families, advocates, teachers, teacher educators, researchers, and policy makers.

American Institute for Research www.air.org

One of the world's largest behavioral and social science research and evaluation organizations, AIR uses the best science available to bring the most effective ideas and approaches to enhancing everyday life for people with disabilities.

STATE-BY-STATE RESOURCES

Alabama

Alabama Department of Education

Alabama's Department of Education provides a list of general information and resources for assistive technology in the state, as well as an AT consideration guide for the IEP team. <http://www.alsde.edu/sec/ses/Pages/assistivetechonology-all.aspx>

STAR

Alabama's statewide federally-funded assistive resource. Includes an online questionnaire to help you find AT resources near you. www.startraining.org

UCP Huntsville

Collaborates with STAR to provide onsite AT training in community settings, demonstration and loan of assistive technology items, technical assistance, AT resources and referrals, conference presentations, resource fairs and community events, for families, caregivers, and related professionals. www.ucphuntsville.org

Arkansas

Assistive Technology of Alaska

Provides tools to allow students the opportunity to access the curriculum at a more equal level.

<https://www.atlaak.org/services/education/>

Arizona

Technology Access Center of Tucson (TACT)

Provides timely, inexpensive, objective, state-of-the-art information about assistive technology (AT).

<http://www.tactaz.org/>

AZ Tech

AZ Tech assists public education agencies, parents, and other government entities in building their capacity to consider and implement assistive technology for students with disabilities in order to improve access to the general education curriculum.

<http://www.azed.gov/specialeducation/at/>

Arkansas

Arkansas Department of Education

The Arkansas Department of Education provides a resource list of technical assistance services and providers.

<http://www.arkansased.gov/divisions/learning-services/special-education/technical-assistance-providers>

California

Team of Advocates for Special Kids

TASK serves families of children aged birth to 26 years of age under IDEA and other systems mandated to provide services to individuals with disabilities. TASK's Tech Center is a place where children with disabilities and their parents; adults with disabilities; and professionals can learn about assistive technology (AT) through hands-on access to computer hardware, specialized applications, and adaptive equipment.

www.taskca.org/tech-center

Center for Accessible Technology

Focuses on access to computers and technology for people with disabilities.

www.cforat.org

Computer Access Center

Provides a wide-range of services, including collaborative consultations and hands-on exploration of enabling technology, integrated computer-based recreation programs for youth which promote opportunities for young people to develop social relationships, a library of current

information about disabilities and available technology resources, a lending library offering software, hardware and adapted toys, speakers and hands-on workshops on current trends and best practices in technology and disability awareness, ongoing technical assistance to people using adaptive technology, information and referrals through various on-line telecommunication services and databases, and in-service training for school districts and social service agencies. http://lanterman.ca.networkofcare.org/dd/services/agency.aspx?pid=ComputerAccessCenter_581_6_0

Parents Helping Parents iTECH Center

The iTECH Center is the largest assistive technology demonstration center in the San Francisco Bay Area. Our AT Specialists provide parents, professionals, adults, and children the opportunity to explore technology, gain "hands-on" experience with instructional devices, software, and apps, and discover tools that best suit their needs. www.php.com/assistive-technology

Colorado

Colorado Department of Education

The Colorado Department of Education site provides links for assistive technology guidelines for infants, toddlers, children and youth with disabilities as well as its partners. <http://www.cde.state.co.us/early/atech>

Connecticut

Connecticut Department of Education

This publication provided by the Connecticut State Department of Education is a comprehensive guide for assistive technology for ages 3-21 as well as infants and toddlers. <http://www.sde.ct.gov/sde/lib/sde/pdf/publications/atguide/atguide.pdf>

Delaware

Delaware Assistive Technology Initiative

The Delaware Assistive Technology Initiative is a program of the Center for Disabilities Studies at the University of Delaware that connects residents with disabilities to the tools they need in order to learn, work, play and participate in community life safely. <http://dati.org/aboutus/index.html>

District of Columbia

Assistive Technology Program for D.C.

Provides the resources need to allow individuals with disabilities to function independently in the community and in educational settings. <http://www.atpdc.org/>

Florida

Florida Alliance for Assistive Services and Technology

Provides free access to information, referral services, educational programs, and publications in accessible format on extensive topics related to disability rights, laws/policies, and funding opportunities for assistive technology.

www.faast.org

Georgia

Georgia Tech Tools For Life

Provides assistive technology demonstrations, evaluations, and assessments, funding options, education, access to lending libraries, durable medical equipment lending, and individual and group training.

www.gatfl.org

Georgia Project for Assistive Technology

The Georgia Project for Assistive Technology (GPAT), a unit of the Georgia Department of Education, supports local school systems in their efforts to provide assistive technology devices and services to students with disabilities.

<http://www.gpat.org/Georgia-Project-for-Assistive-Technology/Pages/default.aspx>

Hawaii

Aloha Special Technology Access Center

Provide individuals with disabilities, and their families, access to computers, peripheral tools, and appropriate software.

www.pdb.hawaii.edu/resources/aloha-special-technology-access-center-inc-aloha-stac

Hawaii: Assistive Technology Resource Centers of Hawaii

Assistive Technology Resource Centers of Hawaii mission is to link people with technology and empower individuals through its use. ATRC is also the State of Hawaii's designated Assistive Technology Act agency since 1991

<http://www.atrc.org/>

Idaho

Idaho Assistive Technology Project

The Idaho Assistive Technology Project is, a federally funded program that increases the availability of assistive technology devices and services for residents with disabilities.

<https://idahoat.org/>

United Cerebral Palsy of Idaho, Inc.

United Cerebral Palsy (UCP) is a trusted resource for individuals with Cerebral Palsy and other disabilities and their networks. Individuals with cerebral palsy and other disabilities deserve every opportunity to live life to the fullest. UCP strives to make that happen.

5420 W. Franklin Rd. # A
Boise, ID 83705
208-377-8070

Illinois

Infinitec

Provides information about assistive technology as well as training, equipment, and access to specialists and resources.

www.infinitec.org

Illinois State Board of Education

The Illinois State Board of Education provides general information on assistive technology in addition to their *Assistive Technology Guidance Manual*.

<https://www.isbe.net/Pages/Special-Education-Assistive-Technology.aspx>

Illinois

Easter Seals Crossroads

Provides information and referral, funding assistance, public assistance, awareness, and education, device demonstration, device loan, reutilized computers and equipment.

www.eastersealstech.com

Promoting Achievement through Technology and Instruction for all Students

PATINS provides support to Indiana public schools in hopes of creating and sustaining an equitable learning environment for every student.

<http://www.patinsproject.org/>

Iowa

Iowa Department of Education

The Iowa Department of Education site provides a comprehensive outline of what assistive technologies are, areas of assistive technologies, and contacts within the state of Iowa.

<https://www.educateiowa.gov/pk-12/special-education/special-education-programs-services/assistive-technology>

Kansas

Solution Outreach Center

Assists children and adults with disabilities to participate more independently within their environment through assistive technology.

www.occk.com/solution-outreach-center

Assistive Technology for Kansas

ATK connects people with disabilities and health conditions of all ages with the assistive technology they need to learn, work, play and participate in community life safely.

<https://atk.ku.edu/>

Kentucky

Bluegrass Technology Center

Provides information and referral, demonstration, consultations, collateral, and intervention, evaluation, training, lending libraries, technical assistance, reutilization, funding navigation, and advocacy.

www.bluegrasstechnologycenter.wordpress.com/about

Western Kentucky Assistive Technology Consortium

Provides assistive technology services to individuals with disabilities, family members, teachers, hospitals, adult day programs, rehabilitation therapists and many more. Services provided by WKATC staff include: information and assistance, device demonstrations, training, short term device loans, technical assistance and public awareness.

www.wkatc.org/assistive_technology_center

EnTech: Enabling Technologies of Kentuckiana

Provides various assessment services both privately and for school districts.

www.entech.spalding.edu

Kentucky Department of Education

This page on the Kentucky Department of Education site outlines resources both in the state of Kentucky and nationally for assistive technologies.

<https://education.ky.gov/specialed/excep/instresources/Pages/Assistive-Technology.aspx>

Louisiana

Louisiana Assistive Technology Initiative

The Louisiana Assistive Technology Initiative's mission is to remove barriers and change lives. This site provides answers to questions, resources, contacts, and services for those need assistive technologies.

<http://www.atanswers.com/>

Maine

Maine Department of Education CITE Program

The Maine CITE program is intended to ensure all Maine learners have access to the assistive technology and accessible instructional materials needed to be successful.

<https://mainecite.org/education/>

Maryland

Maryland Technology Assistance Program

Provides AT evaluations and loans.

www.mdod.maryland.gov/mdtap/Pages/MDTAP-Home.aspx

Maryland Assistive Technology Services

Outlines examples of assistive technologies and who that are used to improve the capabilities of those with disabilities.

<http://dors.maryland.gov/consumers/WTC/RTS/Pages/AT.aspx>

Massachusetts

Massachusetts Department of Education

The Massachusetts Department of Education site provides a comprehensive list of programs, services, and resources pertaining to assistive technology and accessibility.

<http://www.doe.mass.edu/sped/assistive/>

Michigan

Alt Shift

Includes guides and assistive technology contacts by region.

www.altshift.education

Michigan Alliance for Families

The Michigan Alliance for Families: Information, Support, and Education details what assistive technologies are, how they are utilized, the laws pertaining to ATs, and what help is provided within the state of Michigan.

<http://www.michiganallianceforfamilies.org/education/assistive-technology/>

Minnesota

Minnesota Department of Education

The Minnesota Department of Education (MDE) supports a variety of Assistive Technology initiatives designed to help ensure students with disabilities have access to appropriate assistive technology and receive a free, appropriate public education.

<http://education.state.mn.us/MDE/dse/sped/tech/index.htm>

Mississippi

Mississippi: Project Start

Mississippi Project START (Success Through Assistive Rehabilitative Technology) is the federally funded Assistive Technology Act Program for the State of Mississippi and operates under the Department of Health and Human Services' Administration of Community Living.

<http://www.msprojectstart.org/>

Missouri

Missouri Department of Education

The mission of Missouri Assistive Technology is to increase access to assistive technology for Missourians with all types of disabilities, of all ages.

<https://dese.mo.gov/special-education/effective-practices/assistive-technology>

Montana

Parents, Let's Unite for Kids

Includes a directory of assistive technology resources.

www.pluk.org

Aspire

MonTECH is a program of the University of Montana Rural Institute: Center for Excellence in Disability Education, Research, and Service.

<http://aspirewest.org/montana/assistive-technology-montana>

Nebraska

Assistive Technology Partnerships

ATP staff provide guidance to the IEP and IFSP Team on assessing and selecting appropriate assistive technology.

<https://atp.nebraska.gov/services/services-school>

Nevada

Assistive Technology Collaborative

[http://adsd.nv.gov/Programs/Physical/ATforIL/Nevada_Assistive_Technology_Collaborative_\(NATC\)/Nevada_Assistive_Technology_Collaborative_\(NATC\)/](http://adsd.nv.gov/Programs/Physical/ATforIL/Nevada_Assistive_Technology_Collaborative_(NATC)/Nevada_Assistive_Technology_Collaborative_(NATC)/)

New Hampshire

Assistive Technology Resources

The Institute on Disability is the lead agency for New Hampshire's statewide Assistive Technology Act Program: Assistive Technology in New Hampshire, or ATinNH. The program has two major activity areas: *Training, Education and Outreach: AT Trainings, Classes, and Workshops* and *AT Policy and Assistive Technology Services: Equipment Demonstrations, Loans and Refurbishing/Reuse*.

<https://iod.unh.edu/projects/assistive-technology-new-hampshire-atinnh>

New Jersey

TECH Connection

Provides individual assistive technology evaluations.

www.techconnection.org

Adaptive Seating and Enabling Equipment Center

The Adaptive Seating and Equipment Center at Lakeview School offers state of the art evaluation technology and simulators to assure that the most appropriate mobility devices and seating systems are designed to meet the unique needs of each student for use at school, home and in the community.

www.njied.org/adaptive-seating-enabling-equipment-center

New Jersey Department of Education

This page on the New Jersey Department of Education provides educational links, information and resources on assistive technology and universal design for learning

<http://www.nj.gov/education/specialed/tech/>

New Mexico

New Mexico Technology Assistance Program

NMTAP offers free services to New Mexicans with disabilities to help them get the assistive technology services they need. It is a statewide program designed to increase knowledge of, access to, and acquisition of assistive or adaptive technology for anyone with any disability, anywhere in the state, of any age.

<http://www.tap.gcd.state.nm.us/>

New York

New York Department of Education

Here the New York State Department of Education explains assistive technologies in addition to providing additionally informational sites and resources.

<http://www.nysed.gov/edtech/assistive-technology-0>

North Carolina

North Carolina Assistive Technology Program

Provides device demonstration, short-term device loans, and reutilization of assistive technology

www.ncdohhs.gov/divisions/vocational-rehabilitation-services/north-carolina-assistive-technology-program

North Dakota

Aspire

The North Dakota Aspire chapter provides resources for those with disabilities to find services and tools to improve their daily living with use of assistive technologies.

<http://aspirewest.org/north-dakota/assistive-technology-north-dakota>

Ohio

Ohio Department of Education

The Assistive Technology and Accessible Educational Materials Center is a centralized, responsive resource center that empowers individuals with disabilities by providing accessible education materials, access to assistive technologies and highly specialized technical assistance and professional development support.

<http://education.ohio.gov/Topics/Special-Education/Federal-and-State-Requirements/Operational-Standards-and-Guidance/Assistive-Technology-and-Accessible-Educational-Ma>

Oklahoma

Oklahoma Department of Education

Assistive Technology services offered throughout Oklahoma are outlined here as well as resources for students and school personnel.

<http://sde.ok.gov/sde/assistive-technology>

Oregon

Oregon Technology Access Program

The Oregon Technology Access Program (OTAP) provides training, information, technical assistance and resources regarding the uses of technology for children with disabilities. OTAP services are available to anyone concerned with the needs of Oregon's children with disabilities from birth to age twenty-one. The program is sponsored by the Oregon Department of Education.

<https://douglasesd.k12.or.us/otap/home>

Pennsylvania

Pennsylvania Assistive Technology

This website links to products and equipment that may aid in the assistance of children and adults with disabilities and functional limitations.

<http://www.dhs.pa.gov/citizens/assistivetechology/>

Rhode Island

TechACCESS Center of Rhode Island

Provides assistive technology evaluations and consultations/trainings for children and students from early intervention to grade 12 (or the age of 21). Also provides services to educational team members and families to insure that they are able to support students fully in school, the community and at home.

www.techaccess-ri.org

South Carolina

South Carolina Department of Education

The mission of Assistive Technology Services is to provide assistive technology support, training, consultation, and technical assistance to educators who teach students at risk and students with disabilities.

<https://ed.sc.gov/districts-schools/special-education-services/data-and-technology-d-t/assistive-technology-services/>

South Dakota

Aspire

The South Dakota Aspire chapter provides resources for those with disabilities to find services and tools to improve their daily living with use of assistive technologies.

<http://aspirewest.org/south-dakota/assistive-technology-south-dakota>

Tennessee

Tennessee Department of Education

https://www.tn.gov/content/dam/tn/education/teis/teis_policy_08-028_assistive_tech_service_des_cr.pdf

Signal Center's Assistive Technology Center

Provides assessments, loans and reuse, and other services to children and adults with disabilities.

www.signalcenters.com

East Tennessee Technology Access Center, Inc.

Provides various assistive technology services to children and adults with disabilities.

www.etac.org

Mid-South Access Center for Tennessee

Provide home, school, and work environment evaluations, install and configure assistive technology, and provide training.

www.memphis.edu/act

Technology Access Center

Promotes the independence and participation of individuals of all ages with disabilities in school, work, play and everyday activities through their use of assistive technology.

www.tacnashville.org

West Tennessee Special Technology Access Resource Center

Provides information and tours for assistive technology, demonstrations of both low-tech and high-tech devices, reutilization and loan program for devices and equipment, adaptations for computers and smartphones, and workplace accommodations and accessibility.

www.star-center.org

Texas

Texas Department of Education

This page on the Texas State Department of Education site provides information about assistive technology and the areas providing technical assistance for its use.

https://tea.texas.gov/Academics/Special_Student_Populations/Special_Education/Programs_and_Services/Sensory_Impairments/Assistive_Technology/

Utah

Utah Assistive Technology Program

Provides assistive technology devices and services as well as train to university students, parents,

children with disabilities and professional service providers about assistive technology. Coordinates services with community organizations and others who provide independence-related supports to individuals with disabilities.

www.uatpat.org

Utah State Instructional Materials Access Center

The USIMAC provides resources, guidelines, and services for those with disabilities.

<http://www.usimac.org/>

Vermont

Vermont Assistive Technology Program

The Vermont Assistive Technology Program is an organization that help individuals of all ages find accessible solutions to overcome barriers at home, work, school, and in the community as related to disability and aging related needs.

<http://atp.vermont.gov/>

Virginia

Virginia Assistive Technology System

The mission of the Virginia Assistive Technology System (VATS) is to ensure that Virginians of all ages and abilities can acquire the appropriate, affordable assistive and information technologies and services they need to participate in society as active citizens.

www.vats.org

Virginia Department of Education

This guide provided by the Department of Education of Virginia is a comprehensive guide to assistive technologies and the use of instructional technologies.

http://www.doe.virginia.gov/special_ed/iep_instruct_svcs/assistive_technology/what_is_assistive_techology.pdf

Washington

Washington Assistive Technology Act Program

The Washing Assistive Technology Act Program offers devices and equipment used to improve capabilities and daily living for those with disabilities.

<http://watap.org/>

West Virginia

West Virginia Department of Education

The West Virginia Department of Education details key questions and answers regarding assistive technologies in addition to resources for ATs within the state of Washington.

<http://wvde.state.wv.us/osp/assistivetechonology.html>

Wisconsin

Wisconsin Department of Public Instruction

The state of Wisconsin's Department of Public Instruction site provides details on the special education laws pertaining to assistive technology, examples of AT devices, services and special consideration factors.

<https://dpi.wi.gov/sped/educators/consultation/assistive-technology>

Wyoming

Wyoming Department of Education

The Department of Education of the state of Wyoming details what assistive technology devices and services are and how they can help people with disabilities.

<https://edu.wyoming.gov/in-the-classroom/special-programs/assistive-technology/>

Questions? Email us at info@brainrecoveryproject.org

The definitions of AT devices and AT services contained in IDEA 2004 read as follows:

§300.5 Assistive technology device.

Assistive technology device means any item, piece of equipment, or product system, whether acquired commercially off the shelf, modified, or customized, that is used to increase, maintain, or improve the functional capabilities of a child with a disability.

§300.6 Assistive technology service.

Assistive technology service means any service that directly assists a child with a disability in the selection, acquisition, or use of an assistive technology device. The term includes—

- (a) The evaluation of the needs of a child with a disability, including a functional evaluation of the child in the child's customary environment;*
- (b) Purchasing, leasing, or otherwise providing for the acquisition of assistive technology devices by children with disabilities;*
- (c) Selecting, designing, fitting, customizing, adapting, applying, maintaining, repairing, or replacing assistive technology devices;*
- (d) Coordinating and using other therapies, interventions, or services with assistive technology devices, such as those associated with existing education and rehabilitation plans and programs;*
- (e) Training or technical assistance for a child with a disability or, if appropriate, that child's family; and*
- (f) Training or technical assistance for professionals (including individuals providing education or rehabilitation services), employers, or other individuals who provide services to, employ, or are otherwise substantially involved in the major life functions of that child.*

¹ “On a case-by-case basis, the use of school-purchased assistive technology devices in a child's home or in other settings is required if the child's IEP Team determines that the child needs access to those devices in order to receive FAPE.” IDEA, Section 300.105 (Assistive Technology) (Authority: 20 U.S.C. 1412(a)(1), 1412(a)(12)(B)(i))

² Does the current strategy, modification or device encourage the level of desired independence, allowing the student to remain in the least restrictive environment (LRE) where he or she is able to receive FAPE? “Each public agency must ensure that assistive technology devices or assistive technology services, or both, as those terms are defined in Sec. Sec. 300.5 and 300.6, respectively, are made available to a child with a disability if required as a part of the child's Special education, Related services, or Supplementary aids and services.” (Authority: 20 U.S.C. 1412(a)(1), 1412(a)(12)(B)(i); Sec. 300.34, 300.36, 300.38 and 300.114(a)(2)(ii).)

³ 34 CFR 300.5

⁴ 34 CFR 300.6

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