

The following overview of assistive technology was developed for the CRP-RCEP Region IV. This and other resources designed for community rehabilitation provide can be found on the CEON website.

http://www.myceon.com/archives/assistive_technology.htm

Introduction

Using Assistive Technology Resources and Services

For Americans without disabilities, technology makes things easier. For Americans with disabilities, technology makes things possible. -- Mary Pat Radabaugh

Technology has become an integral part of our lives. We use products and aids such as can openers, shopping carts, computers, and remote controls without thinking of these as "assistive technology". Almost everyone at some point will need some type of "assistive technology" (AT) to help in performing basic tasks and activities. For many people this may only involve a need for reading glasses, a step stool to reach something on a shelf, or an opener for a jar. For others there will be need for specialized products to help with mobility, communication or in operating equipment in a work setting. Without these resources, options and opportunities in all aspects of the lives of persons with disabilities can be limited.

Many individuals served through community rehabilitation programs will be able to benefit from assistive technology and accommodations to environments where they function. When used effectively these resources and accommodations can help to

- ***restore functional capacities*** which may have been lost or diminished;
- ***maintain capabilities*** longer despite debilitating or progressive conditions, thus extending employment potential; or
- ***improve performance*** through exploring new ways to complete tasks and activities using assistive devices or simple strategies that actually increase what someone can accomplish.

Assistive technology resources and services are important tools that can be used to enhance services provided through community rehabilitation programs. These resources however are not cure all solutions for every problem encountered by persons with disabilities. A thorough assessment of each individual's situation, including careful consideration of assistive technology options, is needed to determine if AT resources can make a difference in overcoming barriers that could help to maximize potential and expand options.

This module will introduce you to assistive technology, answer some basic questions that describe what is included in AT, discuss who can benefit from AT, why you may need to use it, where you can find information and technical assistance, and what these services and resources may cost.



Did You Know?

Assistive technology resources and services are being used to enhance the services outcomes for persons with disabilities in schools, rehabilitation programs, and employment. Ongoing mandates in key legislation such as the [Amendments to the Rehabilitation Act](#) and the Individuals with Disabilities Education Act (IDEA) continue to promote increased consideration and use of these resources. Accreditation groups such as the Commission on Accreditation of Rehabilitation Facilities (CARF) now include guidelines standards for assistive technology.

- **AT Products:** Over 29,000 commercially assistive technology products are on the market. ([AbleDATA](#), 2003)
- **Low Tech to High Tech:** Assistive technology products range from lever handles and cords to aid in opening doors to voice-activated environmental controls that can open doors automatically.
- **Universally Designed Products** : Designing things, places, and communications so that they work for the widest possible spectrum of users without adaptation or specialized design is creating a rapidly growing number of products that meet the needs of everyone, including persons with differing functional capabilities. ([Adaptive Environments](#), 2003)
- **Assistive technology services** include: *"any service that directly assists an individual with a disability in the selection, acquisition or use of an assistive technology device"* (Technology-Related Assistance Act, 1988).

This broad range of services includes:

- ***evaluation of the needs of an individual*** , including a functional evaluation of the individual in the individual's customary environment;
- ***selecting, designing, fitting, customizing, adapting, applying, maintaining, repairing or replacing assistive technology devices;***
- ***coordinating and using other therapies, interventions, or***

- services with assistive technology devices;*
 - **training or technical assistance** for an individual with disabilities; and
 - **training or technical assistance** for persons involved in the major life functions of individuals with disabilities.
- Local office supply and home improvement centers can be great sources of low-cost, readily available products and materials for making accommodations.
- **Costs** for many products used by persons with disabilities, such as voice recognition technology, have come down significantly due to more widespread use in other applications.
- Often the [costs for worksite accommodations](#) will be minimal. The Job Accommodation Network (JAN) has frequently reported that over 50% of the workplace accommodations cost less than \$500. (JAN, 2001)



Links

With the wide range of commercially available AT products, and countless more universally designed consumer and industrial products on the market, keeping current with what is available is challenging. The following links should be helpful in learning about products and services that can be used to assist persons with disabilities in work and everyday activities.

[AbleDATA](#)

AbleDATA provides information on assistive technology and rehabilitation equipment available from domestic and international sources to consumers, organizations, professionals, and caregivers within the United States. It features a searchable database of 29,000+ assistive technology products.

[ADA Information](#)

Source of information and technical assistance on the Americans with Disabilities Act. Covers design standards, ADA information, technical assistance program, enforcement, code certification plus current status update and information on new and proposed standards.

[AssistiveTech.Net](#)

Assistivetech.net is an online information resource providing up-to-date, thorough information on assistive technologies, adaptive environments and

community resources. While assistivetech.net focuses on the needs of people with disabilities, including their families, service providers and members of their communities, we recognize the importance of these resources to everyone. The same assistive technology that makes things possible for people with disabilities makes things easier for those without disabilities.

[Job Accommodation Network](#)

The Job Accommodation Network (JAN) is a free consulting service that provides information about job accommodations, the Americans with Disabilities Act (ADA), and the employability of people with disabilities.



Successful Practices

Using assistive technology (AT) and work site accommodations that include AT is a dynamic, interactive process that almost always has multiple solutions. Solutions to problems can range from simple low-tech problem solving to high-tech computer technology. With any consideration of technology resources it is very important that the consumer is at the center the process. Determining what the "best" solution is depends on many factors. Consumer choice, cost, resources available, time constraints, employer considerations, co-worker involvement, and safety concerns are some of the variables that should be taken into consideration. This is often a process of experimentation and problem solving that should involve everyone in the rehabilitation process.

- **Integrating consideration of assistive technology:** Effective use of assistive technology usually begins with the consumer and their counselor or case manager recognizing that there may be a need for AT. In the vocational rehabilitation process a system called "Tech Points" identifies places in the rehabilitation process where consideration of assistive technology should take place (Tech Points, 1994). These points include the initial intake and first contact with the individual, during the assessment process, when plans are being developed, needs that may come up during training, accommodations that may be needed at the worksite and as part of regular follow-up. It's important that AT needs be considered on a systematic basis throughout the rehabilitation process, whether in a rehabilitation agency, school or community rehabilitation program.
- **Assistive technology needs** should be considered for all persons. AT needs of individuals with severe disabilities are often more evident, however AT needs of persons with less obvious and hidden disabilities can also have a significant impact. For example, persons

with learning disabilities can use voice output and personal digital assistants (PDAs) to assist in following instructions and organizing their activities.

- **Expanding Options and Opportunities:** Making career decisions without considering how AT products or worksite accommodations could expand possibilities or overcome obstacles can significantly limit choices for an individual. For example, developments with new technology such as screen readers, cognitive memory aids, or lifting devices can open employment opportunities for persons with wide ranging disabilities that otherwise would not have been considered feasible.
- **Impact of the environment:** Often we find that the "disability" may not be as much with the individual as it is with the environments in which someone functions. The physical surroundings, workstations, tools and interaction with other people can have a profound impact on a person's effectiveness. Assessments in actual work environments and job analysis can help to identify how changes in the environment can make a difference.
- **Training Needs:** Rehabilitation staff and educators need in-service training to develop sufficient awareness of assistive technology and how these resources can be used to overcome problems that present barriers for persons with disabilities. Training sessions such as "Lunch and learn" presentations can be a good way to expose staff to AT products and resources. AT specialists can present on topics or rehabilitation technology suppliers can bring in products for demonstrations.
- **Partnering with Others:** Many community rehabilitation programs have AT specialists on staff. Others may need to collaborate and partner with programs and agencies to arrange for access to specialists. AT specialists are usually available, however arrangements may be needed to share costs and resources. Sometimes it can be difficult to locate specialists who have the particular expertise needed. For a list of credentialed AT practitioners (ATP) go to the [RESNA website](#).

Making It All Work

Assistive technology resources and services can have a positive impact on employment outcomes and independent living options for persons with disabilities. There is no one best practice to follow in approaching how to make assistive technology an integral part of the day-to-day practice in rehabilitation programs.

Determining the best approach often begins with wondering, *what if...*

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CRP-RCEP IV Related Activities

The CRP-RCEP is collecting additional information and training resources on assistive technology that will be added to the website. We are partnering with [Tech Connections](#) to make many of their resources available to you directly through the CEON website.

We welcome questions and requests related to assistive technology resources and services in the work that you are doing. If you have training needs in this area please let us know.

Send us your questions or comments

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