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## ABSTRACT

This paper describes DO-IT (Disabilities, Opportunities, Internetworking and Technology), a cooperative program of the University of Washington and the High School/High Tech program to increase the career success of individuals with disabilities by providing access to technology, career preparation activities, and work experiences. DO-IT works with high school teachers, post-secondary faculty, and employers and helps people with disabilities to use computers, adaptive technology and the Internet; to transition from high school to college or from two-year to four-year colleges; and to transition from school to work. DO-IT activities include: Internet, college transition and career preparation; a summer study and summer camp programs for youth with disabilities; Internet-based mentor support, peer support through on-line communities of students with disabilities; leadership opportunities for students; and internships, cooperative education and other work-based learning experiences. High School/High Tech focuses on creating partnerships among state and local stakeholders to promote careers in science, engineering, and technology for students with disabilities. Among its activities are site visits by students to high tech businesses, mentoring, job shadowing, and summer and part-time employment. (DB)

# FROM HIGH SCHOOL TO COLLEGE TO WORK: STUDENTS WITH DISABILITIES IN HIGH TECH FIELDS

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The 1994 Survey of Income and Program Participation (SIPP) revealed that 73.9 percent of people with severe disabilities are not working full- or part-time. Of those adults with disabilities who are working, three out of ten have reported income below the poverty level. Each year, the lack of labor force participation by people with disabilities costs the economy 200 billion dollars (Profit from Our Experience, 1995). Obstacles to equitable participation include lack of exposure to mainstream work experiences, lack of adequate support systems, lack of awareness and access to technology that can increase independence and productivity, little access to successful role models, and low expectations on the part of people with whom they interact (Aksamit, Leuenberger & Morris, 1987; Burns, Armistead & Keys, 1990; "Changing America," 1989). These barriers result in fewer capable students with disabilities completing post-secondary degrees and entering professional careers, especially in high tech fields.

Today, almost all careers require computer use. Unfortunately, many people are unaware of the tremendous impact technological innovations can have in helping individuals with disabilities reach their potentials (Anson, 1997; Closing the Gap, 1999; Cunningham, & Coombs, 1997). With recent developments in the area of adaptive technology, there is no reason why talented young people with disabilities cannot find success in high tech fields. People with disabilities who have computer skills can find opportunities in fields that were once closed to them. For example, a blind person with training in information systems can be equally productive as a sighted employee if he has access to technology that provides optical character recognition, Braille, and voice output. A person with no use of her hands can use voice input, head control, and other input methods to control all computer functions.

Having work experiences during school are associated with better employment outcomes for individuals with disabilities (Doren & Benz, 1998). DO-IT (Disabilities, Opportunities, Internetworking and Technology) at the University of Washington and the President's Committee on Employment of People with Disabilities' High School/High Tech program have partnered to increase the career success of individuals with disabilities by providing access to technology, career preparation activities, and work experiences that help students with disabilities prepare for success in high tech careers.

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C 309131

| Top |



## DO-IT

DO-IT, primarily funded by the National Science Foundation, the U.S. Department of Education and the State of Washington, serves to increase the success of people with disabilities, especially in fields where they have been traditionally underrepresented, such as science, engineering, mathematics and technology. DO-IT uses technology to maximize the independence, productivity and participation of students with disabilities in academic programs and careers.

DO-IT works with high school teachers, post-secondary faculty, and employers to make programs and resources fully accessible to people with disabilities. DO-IT also helps people with disabilities:

1. use computers, adaptive technology and the Internet;
2. prepare for challenging careers;
3. transition from high school to college, from two- to four-year colleges, from undergraduate work to advanced studies;
4. transition from school to work; and
5. gain access to libraries, labs and electronic information resources.

DO-IT activities include:

1. Internet, college transition and career preparation;
2. a summer study and summer camp programs for youth with disabilities;
3. Internet-based mentor support for youth with disabilities;
4. peer support through on-line communities of students with disabilities;
5. panels, presentations and other leadership opportunities for youth with disabilities; and
6. internships, cooperative education and other work-based learning experiences for high school and college students with disabilities.

The DO-IT CAREERS (Careers, Academics, Research, Experiential Education and Relevant Skills) project works specifically to increase the successful participation of high school and college students in work-based learning programs, such as internships and cooperative education activities. Work experience before graduation is beneficial for all students. It allows them to gain access to specialized facilities not available on campus, apply skills learned in the classroom in a real-world environment, and develop a network of potential employers. For students with disabilities, the benefits of work-based learning are even greater than those of their non-disabled peers. Internships and other work experiences allow students with disabilities to practice disclosing and discussing their disabilities while determining which accommodations are appropriate for particular jobs and employment situations.

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| [Top](#) |

## HIGH SCHOOL/HIGH TECH

High School/High Tech, a program of the President's Committee on Employment of People with Disabilities, creates partnerships among state and local stakeholders to promote careers in science, engineering and technology for students with disabilities. Employers, educators, consumers, and service providers work together to coordinate local programs. The goals of High School/High Tech are:

1. to motivate students with disabilities to explore their potentials and interests in science, engineering and technology career fields;
2. to encourage and facilitate students' aim for college and the pursuit of a degree in their chosen area of study;
3. to help them become independent and productive members of the technology-driven workforce of today; and
4. to assist professionals in science, engineering and technology fields in understanding the uses of adaptive technology and the accommodation needs of people with disabilities.

High School/High Tech programs incorporate a mix of learning activities designed to facilitate and broaden the horizons of high school students with disabilities. Typical activities include:

1. Site Visits - students visit high-tech businesses to observe day-to-day operations;
2. Mentoring - professionals in science, engineering and technology fields act as career advisors to proteges with disabilities;
3. Job Shadowing - students observe individuals working in their career of interest;
4. Guest Speakers - professionals deliver presentations to groups of High School/High Tech students about their work and companies;
5. After School Activities - students work on interesting science, technology and engineering projects, many times in conjunction with local businesses;
6. Summer Camps - students attend a variety of classes related to science, engineering and technology, usually in a college setting; and
7. Employment - students work in summer and part-time jobs in science, engineering and technology companies.

High School/High Tech has reached students with disabilities in more than forty-five states. The project includes a diverse representation of students, including minorities and women, who traditionally have not pursued careers in these fields. The success rate of participants is high as they transition from high school to college to careers.

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| [Top](#) |

## **DO-IT and HIGH SCHOOL/HIGH TECH PARTNERSHIP**

DO-IT and High School/High Tech have many common goals. They are partnering to expand opportunities for high school students with disabilities in Washington State. Other community stakeholders (e.g., businesses, state and federal agencies, schools and community service organizations) are invited to collaborate with us to make this effort a success. The powerful combination of technology, education, mentoring and work experiences create avenues for capable students with disabilities to pursue and realize their academic and career goals.

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| [Top](#) |

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| [Top](#) |

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