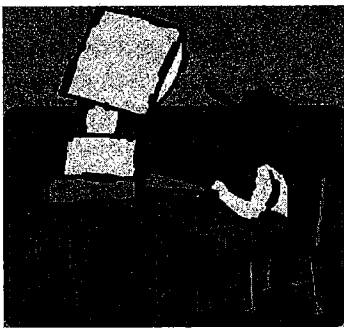


# The Internet as an Aide to Teaching the Gifted

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## What are some exciting and valuable ways for gifted students to use the Internet?

Greater opportunities exist now for meeting the needs of gifted and talented students than ever before. Even though the Internet is still in its infancy, the depth and breath of available information that it offers make it a versatile and extensive resource for developing talent. While we often view the Internet as a giant library, its role goes well beyond this. Several uses of the Internet with gifted and talented students are particularly worth noting.

### Advanced and Accelerated Classes

The Internet shows great promise for students whose schools are not equipped to meet their advanced academic needs. Online courses are a viable option for gifted and talented students for the following reasons:

- Most schools cannot provide the variety of specialized curriculum necessary to satisfy gifted and talented students' interests and academic needs. This is particularly true for small schools in rural areas where a secondary teacher may be expected to teach all of the science courses or several different subject areas. Students who take courses on the Internet are no longer limited to the expertise of their local teachers.
- Courses may not fit into gifted students' schedules, or students may wish to enroll in more courses than fit their schedules. For example, a student with music interests may be forced to choose between participating in the school orchestra and participating in an advanced course. Many gifted and talented students are capable of completing more academic courses than fit into their school schedules. These students can complete online courses outside their school days.
- The pace of some courses may be too slow for gifted students, and the instructional level may not be sufficiently challenging. For example, a talented mathematics student might be able to complete her yearlong high school calculus class in a fraction of the time or at a much higher level. This student would benefit from a university calculus class that covers the content more quickly and with greater depth. Dual enrollment in a local university is one way to meet this need. The availability of a local university and transportation to attend the university course are often roadblocks to this option. Completing the course online eliminates these obstacles (Siegle, 2004).

Many states operate virtual schools, and most universities offer online courses as well. Two issues need to be addressed before enrolling a student in an online course. The first involves students' strengths and learning styles. Online learning is not for everyone. Students who are successful online are actively engaged, curious, focused, flexible, and highly motivated. Educators and parents cannot assume that all gifted and talented students have the technological, time-management, and study skills necessary to be successful online (Siegle, 2005a).

Second, not all online courses and course providers are equal.

Parents and educators should check the accreditation of the offering institution. They should also learn about transferability of credits, dropout rates, instructor certification, amount and type of interaction, and special technology or equipment that might be needed (Siegle, 2005b).

### **Telementoring**

Gifted and talented students may benefit from mentoring experiences. Mentoring does not need to take place in person. Following are some unique advantages of telementoring:

- Provides a means of connecting thousands of professionals with students on a scale that is impractical in traditional face-to-face mentoring
- Matches students with appropriate mentors without geographic limitations
- Allows convenient, consistent, weekly communication between students and mentors and creates archives of all communications
- Eliminates scheduling problems between mentors and students because email communication can be sent anytime
- Provides an opportunity for students to work on long-term projects with their mentors and allows mentors to see the impact they have on students (International Telementoring Program [ITP] [www.telementor.org](http://www.telementor.org)).

The ITP assists teachers in locating electronic mentors for their students. The diversity of gifted students' interests and skills demands they receive advanced training that is often beyond the confines of their schools or communities. Telementors add a level of sophistication to students' learning experiences.

In addition to providing advanced content, telementors can also provide emotional support for young people as they develop their talents. Since many mentors were once gifted and talented students themselves, they understand the trials and tribulations of developing one's talent in a given discipline. Naturally, all telementoring contact should occur within a secure, monitored system which protects the mentee and the mentor.

### **Free Electronic Books on the Internet**

One of the fastest growing publishing areas is electronic books. While the public has been slow to warm up to the idea of "curling up with a laptop and reading a favorite spy novel on a chilly evening," advances in electronic books in the last four years make them a viable option for gifted and talented readers. Thousands of classic literature titles are now available on the Internet. Many books whose copyrights have expired are in the

public domain and are available for free. Literature teachers can easily differentiate reading options for talented readers. Gifted readers can be assigned literature beyond grade level and students can select books based on interest, all without concern about additional expenses. Three outstanding free sources of electronic books are the Internet Public Library ([www.ipl.org](http://www.ipl.org)), Project Gutenberg ([www.gutenberg.org](http://www.gutenberg.org)), and the University of Virginia Electronic Text Center ([etext.lib.virginia.edu/ebooks/](http://etext.lib.virginia.edu/ebooks/)).

Another reason that eBooks are viable is versatility. Microsoft's Reader can be downloaded free from the Internet at [www.microsoft.com/reader/downloads/default.asp](http://www.microsoft.com/reader/downloads/default.asp). The features built into the reader are impressive. A variety of language dictionaries can be downloaded at [www.microsoft.com/reader/downloads/dictionaries.asp#english](http://www.microsoft.com/reader/downloads/dictionaries.asp#english). The definition for any word selected in an eBook can instantly be displayed. This function is not limited to English definitions. The dictionary function will also translate any word into another language. Dictionaries are also available to translate other languages to English.

A myriad of features exist beyond the dictionary function.

- Notes can be attached to pages in electronic books.
- Electronic pencils are available within the book for marking on pages.
- Words and phrases can be highlighted in a variety of colors.
- Types can be enlarged for students with vision problems.
- A synthesized voice is available to read the book.

Students can also create their own electronic books from their own documents. An eBook creator program is available free at [www.microsoft.com/reader/developers/downloads/rmr.asp](http://www.microsoft.com/reader/developers/downloads/rmr.asp).

Hundreds of electronic books can be stored easily on an inexpensive flash drive or CD-ROM. The days of students bearing heavy backpacks filled with books may soon give way to a personal library of hundreds of books hung around a neck or attached to a keychain.

### **Publishing Platform**

The Internet created a democratization of knowledge. Information is available to more people than at any time in history, and the ability to share creative accomplishments has also expanded. A decade ago publishing was restricted to major companies with printing presses and distribution networks. Gifted and talented students can now share their ideas and creative products with the

world. Teachers can create online literary magazines for their classes or schools. The content can be stored on the school web server or on free space available on the Internet. Geocities ([geocities.yahoo.com/](http://geocities.yahoo.com/)) is one of the largest providers of free website space. The site also includes an easy-to-use web-building program that allows users to create attractive webpage designs. Full student names should never be used, and student and parent permission must be obtained before posting student work. Some schools use first names or student initials to identify the creators. Other schools have students draw self-portraits and write brief biographies.

The publishing platform role goes beyond uploading art and writings. It also includes sharing ideas. Students who once felt isolated can voice their ideas and thoughts through webpages or personal blogs. Of course, parents and educators must carefully monitor Internet interactions and spend time with students discussing the dangers associated with personal contacts made on the Internet. Several organizations provide monitored email and chat rooms where students can post their ideas. One such site is [www.kids-space.org](http://www.kids-space.org). With proper precautions, students celebrate their creative accomplishments and ideas on the Internet where others may enjoy and appreciate them.

### Interactive Projects

Educators and parents can arrange interactive projects between gifted and talented students in different parts of the country or even the world. Through email, young people can share stories about where they live with individuals from different cultures. Students can also collaborate on group projects that can be found through Internet search engines or indexes of interactive projects such as the one found at [www.pwcs.edu/i-tech/internetprojects.htm](http://www.pwcs.edu/i-tech/internetprojects.htm).

Students who enjoy playing chess or backgammon can find a playing partner any time of day for a variety of games at [www.zone.com](http://www.zone.com). Web contacts do not necessarily need to be with other humans. Sites abound on the Internet featuring interactive educational games. Virtual tours of famous places or museums are another form of interaction (e.g., [www.nationalgeographic.com/crittercam/](http://www.nationalgeographic.com/crittercam/)).

### Information Resource

The Internet is best known as an information resource. Nowhere will gifted students find more about their interests. Beginning at an early age, they should be taught appropriate/ethical use of information and how to be critical consumers of

information.

First, students should learn how to appropriately paraphrase information when writing papers ([www.indiana.edu/~wts/pamphlets/plagiarism.shtml](http://www.indiana.edu/~wts/pamphlets/plagiarism.shtml)) and the importance of citing the source, even when it is paraphrased. This also includes referencing photographs and graphic images downloaded from websites.

Second, students need to develop a healthy skepticism about information they find. Since much of it has not undergone any type of validity check, students should ask the following questions:

- Has the content of the website been through any type of review?
- Does the website provide citations and references for the information?
- Does the website link to other reputable sites with similar information?
- Does the website provide contact information if one wishes to check on the content?
- Is information provided about the author?
- Is the website a personal site or one associated with an organization or university?
- Would the creator of the website have anything to gain by providing the information?
- Are similar findings reported at other websites? (McCoach, 2002)

While the Internet may not be a complete educational panacea, it can be a major resource for parents and educators as they help their young charges discover and pursue their talents and interests. ❖

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