

Web Technical Designers



Occupational Brief Title Codes:

- D.O.T.: 141.061-018
- G.O.E.: 01.02.03
- S.O.C.: 27-1024
- O*NET™: 27-1024.00
- N.A.I.C.S.: 541511
- H.O.C.: AER

Work Classification Based Related

D.O.T. Occupations:

- Art Directors
- Cartoonists
- Color Experts
- Fashion Artists
- Graphic Artists
- Production Managers for Advertising

Interests Based Related

G.O.E. Occupations:

- Art Directors
- Cartoonists
- Exhibit Artists
- Fashion Designers
- Furniture Designers
- Merchandise Display Artists
- Set Directors
- Set Illustrators
- Sketch Makers

Skills Based Related

O*NET Occupations:

- Art Directors
- Camera Operators, Television, Video, and Motion Picture
- Cartoonists
- Commercial and Industrial Designers
- Directors-Stage, Motion Picture, Television, and Radio
- Fashion Designers
- Interior Designers
- Makeup Artists, Theatrical and Performance
- Painters and Illustrators
- Set Designers

Noteworthy Quote:

“It’s like being an artist who gets to paint with pixels. One of the big payoffs is that five seconds after you complete a site and upload it, the entire world can see your work.”

— Matt Hutton, SpinLight Studio, Champaign, Illinois

Web technical designers (‘web ‘tech-ni-cal ‘de-sign-ers) combine graphics, animation, sound, and programming to create Web sites for corporations, organizations, and individuals that want to establish a presence on the Internet.

When the World Wide Web was first attracting attention in the mid-1990s, some companies were quick to recognize a new opportunity to advertise and sell goods and services. For help with “getting on the Net,” they turned to advertising agencies and graphics arts shops. The field of Web design was so new, however, that even the most eye-catching Web sites did little beyond advertising a company and what it offered.

As Web programmers learned to write applications that integrated databases of products and prices with Web sites, E-commerce developed as a profitable means to communicate and do business with consumers. Visiting a Web site could be an interesting experience, if users found special things to see and do there. To improve users’ experiences, and to encourage them to make purchases, Web technical designers added sound, animation, and interactivity to Web sites.

Today, effective Web sites generate a major source of revenue for many businesses. In fact, the aim of attracting individual consumers is gradually being replaced in importance by business-to-business connectivity. “B2B” as it’s called, generates billions of dollars of commerce through communication, sales, and service. In less than ten years, the work of Web technical designers has changed from using Web sites as advertisements, to marketing goods and services, to placing entire businesses on the Internet.

Work Performed

Web technical designers concentrate on the front end of a Web site, which is what people see when they come to a site. They create catchy graphics or animated images, and choose the styles, fonts, and other visual elements to make a site appealing.

The goal of a Web technical designer is to give a site “stickiness.” “Stickiness” is created by the quality of a Web site’s look, feel, and navigation devices. “Stickiness” should give visitors to the Web site reasons for clicking through pages, asking for information, making purchases, and returning to the Web site again. The success of a company’s Web site depends on “stickiness” as measured by the number of page views seen, the amount of visitor traffic, and the volume of sales.

In the design and planning stage, Web technical designers provide sketches, ideas, and graphics to the team, by using brochures, slides, print advertisements, or other documents provided by the company or client. As the project progresses, Web technical designers build a demonstration site or mock-up of what the completed Web site will look like and do. For example, visitors to an E-commerce site should be able to recognize what the company is selling, and be helped to make purchases. A corporate intranet site, or the network belonging to an organization which is available only to employees, should provide employees with the information they are seeking easily and quickly.

As the project develops, Web technical designers write, code, and create graphics, develop and organize content, build the structure of the site, and work closely with Web programmers to make certain the site functions properly. Once the site is published on the Internet, Web technical designers maintain and update it regularly. To attract more visitors, Web technical designers also develop marketing strategies such as click-throughs from other sites or banners on the Internet where the business's target audience might see them.

Working Conditions

Web technical designers work for an organization, for individuals or groups who are business clients of the organization, or on their own, providing consulting and finished work on a contract basis.

Web technical designers employed by companies work in office environments, surrounded by the equipment required by the job such as computers, scanners, CD players, and digital cameras. In an organization chart of a Web project, Web technical designers belong to the development team, the first-level group. Above them are the information architects, and the project administrators like producers, editors, and project administrators.

Many Web technical designers are self-employed and work on a consulting basis, handling more than one client at a time. They must supply themselves with their own equipment, and perform technical tasks such as programming, in addition to design. Usually, independent Web technical designers end up working full time for a company that initially hired them on a freelance basis.

All Web technical designers work closely with others in meetings and make presentations to groups. Timelines and deadlines create an atmosphere of urgency to this occupation.

Hours and Earnings

Web technical designers, like most professionals in the Internet field, usually supply their work on demand, meaning that their hours can vary from the normal 40-hour work week, to many more than that.

On the other hand, some Web technical designers for Web consulting companies report receiving unscheduled vacations during periods of a work slowdown.

According to the Bureau of Labor Statistics, in 2003, Web technical designers, along with other computer graphic designers, earned an average of \$36,930 a year. Earnings ranged from a high of more than \$65,530 a year to a low of less than \$22,420 a year. Salaries for Web technical designers vary according to geographic location, employer, level of education, and years of experience.

Education and Training

Web technical designers are expected to know text tools such as HTML which is the basic computer language

for creating Web pages and Javascript. In addition, they must be able to create images and animated graphics through using a variety of software such as Photoshop, Illustrator, and ImageReady.

Skills in design layout and copy editing are also increasingly important as Web sites become more sophisticated in their look and feel. Web technical designers who work for companies or clients engaged in E-commerce should have an understanding of marketing, merchandising, attracting audiences, and sales.

To prepare for this field, many Web technical designers recommend a bachelor's degree in graphic design, visual arts, or fine arts. Coursework should include multimedia production, photography, filmmaking, animation, and digital video and sound. Specialized degrees in fields such as user interface design and information design are in demand.

Associate, or two-year, degrees from colleges or technical schools can provide the fundamentals for Web technical design such as color theory, drawing, electronic design, and introduction to databases, but professionals caution that four-year degrees are becoming the norm. Some workers entering Web technical design from other fields take the necessary coursework on their own.

Licensing, Certification, Unions and Professional Societies

There are no licenses or union memberships required to become a Web technical designer. Some workers report enrolling in certification programs offered online or privately. Certificate programs in design, offered by software developers through short-term training classes or intensive two-week "boot camps," indicate that the person has passed a series of exams about Internet technology. These programs tend to be enrolled in by workers coming to Web technical design from a field other than fine arts, graphic design, or computer engineering.

Many professionals in Web technical design belong to professional societies such as the HTML Writers Guild, the International Webmasters Association, the Internet Society, and the World Organization of Webmasters to keep abreast of the latest developments in the field.

Personal Qualifications

Advertisements for Web technical designers call for such personal qualifications as "excellent planning, organizing, and time management skills," "artistic ability," "ability to learn new programs quickly," "ability to communicate well with all levels of the organization," and "an eye for layout."

Web technical designers need people skills and artistic imagination besides mastery of software design tools. In addition, because the occupation requires working with a

team and taking direction from clients and co-workers, workers in this field should be able to accept criticism of their ideas.

Finally, because the technology connected with Web design is constantly changing, successful Web technical designers always investigate new software and hardware products in their field.

Occupations can be adapted for workers with disabilities. Persons should contact their school or employment counselors, their state office of vocational rehabilitation, their state department of labor, or their state department of civil service to explore fully their individual needs and requirements as well as the requirements of the occupation.

Where Employed

Large companies hire Web technical designers to create and maintain their Internet Web sites. The growth of Intranets, or in-house HTML-based networks, means that Web technical designers can also be found in every department of large companies to create and maintain each division's information site.

Businesses that promote other businesses such as advertising agencies, public relations, and marketing firms, have added Web site creation to their list of services, thus creating jobs for Web technical designers.

Graphic design studios, which are often small shops, have combined Web site design with their traditional offerings, too.

Two new areas of the Internet industry employ an increasing number of Web technical designers. Internet service providers, which at one time only provided access to the Internet, now offer Web sites on a server at the "host" site and Web consulting.

Likewise, Internet consulting firms, which help companies build and rebuild their e-business facilities, usually offer their clients Web site creation by Internet professionals.

Many workers in Web technical design are self-employed as independent contractors, serving smaller companies that don't want to hire a full-time Web staff. Independent Web technical designers generally work from home, where all they need is a computer and a high-speed Internet connection. Contracts with a few clients can provide a significant income.

Employment Outlook

Overall, the outlook for Web technical designers is excellent.

First, with more E-businesses going online, the future promises a growing need for Web professionals. Web technical designers will be able to find work with all types of companies, from startups to multinational corporations.

Second, companies with Web sites tend to adhere to the rule that sites should be relaunched three times a year,

meaning that Web sites will continue to be built, rebuilt, and rebuilt again. In all likelihood, salaries for Internet professionals will remain high.

Entry Methods

Web technical designers seeking to enter the field need some formal training in the arts, computers, and design. A two or four-year degree in graphic design or visual arts is recommended.

Persons entering Web technical design from another field of work should enroll at a college or technical school offering art, design, and Internet coursework.

Some Web technical designers are self-taught using books, CD-ROMs, and online courses. However, veteran Web technical designers point out that these methods lack instruction in fundamentals of graphic design.

On the other hand, a portfolio of work that demonstrates experience and artistic ability is often enough for an entry-level position.

Many Web technical designers begin as self-employed professionals and end up working full time for companies that initially hired them as freelancers. Opportunities for Web technical designers can be found by searching online job sites by keyword to zero-in on openings.

Advancement

Being a Web technical designer is usually the first step to occupations that require similar technical skills but more experience and more education. These occupations, in increasing order of responsibility, are multimedia Web designer, user interface designer, and Web site architect.

Multimedia Web designers work closely with Web technical designers, but their job is to add highly interactive, content-rich presentations to Web sites. Their knowledge of advanced software applications gives them the know-how to create, for instance, streaming video, 2D and 3D animation, and interactive CD-ROMs.

Next on the advancement ladder are user interface designers. User interface designers tend to leave the technical side of Web site creation to Web technical designers and multimedia web designers. Instead, they work with marketing and other departments to present a corporate image on the Web site that communicates the right impression to users. User interface designers need a background in artistry, and human factors such as "usability"—how humans interact with technology. A bachelor's or master's degree in design is usually required.

Finally, although it is up to Web technical designers, multimedia Web designers, and user interface designers to decide *how* to present information at a Web site in terms of design, Web site architects decide *what* information is presented. Web site architects are skilled at understanding human nature and how users react to seeing information, graphics, and choices presented at a Web site. Keeping

in mind the goals of the business or industry, Web site architects advise companies about making their site more effective. A bachelor's or master's degree is required, usually with course work in psychology, and experience in Web design.

For Further Research

HTML Writers Guild, 119 East Union Street, Suite F, Pasadena, CA 91103-3952. Web Site: www.hwg.org

International Webmasters Association, 119 East Union Street, Suite F, Pasadena, CA 91103. Web site: www.iwanet.org

Internet Society, 1775 Wiehle Avenue, Suite 102, Reston, VA 20190. Web site: www.isoc.org

National Workforce Center for Emerging Technologies, 3000 Landerholm Circle, SE, Bellevue, WA 98007. Web site: www.nwcet.org

Women in Technology International, 13351-D Riverside Drive #144, Sherman Oaks, CA 91423. Web site: www.witi.com

World Organization of Webmasters, 9580 Oak Avenue Parkway, Suite 7-177, Folsom, CA 95630. Web site: www.joinwow.org

Acknowledgments

Chronicle Guidance Publications appreciates the cooperation of the individuals who reviewed the information in this brief.

O*NET™ is a trademark of the U.S. Department of Labor, Employment and Training Administration.

H.O.C. codes adapted and reproduced by special permission of the publisher, Psychological Assessment Resources, Inc., Odessa, FL 33556, from the *Dictionary of Holland Occupational Codes-Third Edition*, by Gary D. Gottfredson, Ph.D., and John L. Holland, Ph.D. Copyright 1982, 1989, 1996 by PAR, Inc.

Briefs Related to This Title

Animators. **Brief 8.**
Cartoonists. **Brief 124.**
Fashion Designers. **Brief 23.**
Fine Artists. **Brief 653.**
Graphic Designers. **Brief 387.**
Graphics Programmers. **Brief 536.**
Image Consultants. **Brief 625.**
Information Architects. **Brief 68.**
Industrial Designers. **Brief 126.**
Interior Designers. **Brief 30.**
Memorial Designers. **Brief 489.**
Merchandise Displayers. **Brief 127.**
Photographers. **Brief 12.**
Theatrical Production Workers. **Brief 612.**
Web Graphic Designers. **Brief 138.**
Webmasters. **Brief 648.**
Web Programmers. **Brief 296.**

For a complete list of brief and reprint titles with current pricing information call:

Chronicle Guidance Publications, Inc.
66 Aurora Street
Moravia, New York 13118-3569
Phone 1 800 622-7284 FAX (315) 497-3359
Visit our Web Site at
www.ChronicleGuidance.com