Internet Business Associate prepares students to work effectively in today's business environment. In this course, you will learn about the tasks involved in various Information Technology (IT) job roles, and explore career opportunities in the IT industry. You will also learn about Internet connection methods, Internet protocols, the Domain Name System (DNS), cloud computing and mobile devices. You will study the basic functions of Web browsers, the components of Web addresses and browser use in the business world. You will learn how browser plug-ins and add-ons can improve your Web-browsing experience, and you will use browsers to download and manage files.

You will learn about databases as they relate to Web search engines, and you will use search engines to conduct basic and advanced Web searches. This course also teaches you to use local and Web-based (cloud-based) e-mail clients, and it provides guidelines for communicating effectively over the Internet using Web technologies and social networking tools. You will also learn about Internet research and collaboration tools, software development tools, and the patent and licensing practices that accompany software applications.

In addition, you will learn how to protect your privacy and personal information on the Internet. This topic includes protecting your reputation by limiting the information you post online. This course also discusses the risks associated with being connected to the Internet, and the security measures that can keep your computer system and your personal information secure. You will also learn about the use and control of cookies. Finally, you will study the fundamental elements of project and program management, and the importance of acquiring these skills for all IT job roles.

### Topics

#### Introduction to IT Business and Careers
- Information Technology (IT)
- IT Job Roles
- IT Industry Career Opportunities
- Technical Concepts and Training
- Technology Adoption Models
- Business Modeling
- Data Modeling
- The Importance of Standards
- That's a Hot Site

#### Internet Communication
- Communicating via the Internet
- Modern Web Technologies
- Social Networking
- Messaging
- Blogging
- Communicating Effectively over the Internet
- Convergence and Unified Communications Technologies
- Web 2.0 Travel Guide?

#### Introduction to Internet Technology
- Internet Technology
- Overview of Networks
- Overview of the Internet
- Connecting to the Internet
- Internet Protocols
- Domain Name System (DNS)
- Cloud Computing
- Computing in the Cloud

#### Web Browsing
- Introduction to Web Browsing
- Basic Functions of Web Browsers
- Installing a Web Browser
- Web Addresses
- How Browsers Work
- Browser Choices
- Browsing Techniques
- Browser Elements
- Configuring Web Browser Preferences
- Proxy Servers
- Troubleshooting Internet Client Problems
- Working the Help Desk

#### Multimedia on the Web
- Introduction to Multimedia on the Web
- Objects, Active Content and Languages
- Objects and Security Issues
- HTML5 vs. Plug-ins
- Introduction to Plug-in Technology
- Data Compression and Decompression
- Plug-in Installation
- Types of Plug-ins
- Firefox Add-Ons
- Types of Viewers
- Miscellaneous File Formats
- Downloading Files with a Browser
- The Right Tools for the Job

#### Databases and Web Search Engines
- Introduction to Data Searching Tools
- Overview of Databases
- Introduction to Web Search Engines
- Registering a Web Site with a Search Engine
- Types of Web Searches
- Basic Web Searching Techniques
- Boolean Operators
- Advanced Web Searching Techniques
- Using Web Searches to Perform Job Tasks
- Unexpected Web Search Results
- Web Search Strategies
- Evaluating Resources
- Organizing Internet Research
- Citing Copyrighted Online Resources
- To Be Valid or Not to Be Valid?

#### Business E Mail and Personal Information Management
- Introduction to Business Electronic Mail (E Mail)
- How E Mail Works
- E Mail Configuration Requirements
- E Mail Message Components
- Creating and Sending E Mail Messages
Receiving and Viewing E Mail Messages
E Mail in the Workplace
E Mail Problems and Solutions
Personal Information Management (PIM)
Mastering the Art of E-Mail

Protecting Yourself Online
Introduction to Protecting Yourself Online
The Right to Be Forgotten
Spam
Cookies
Configuring Browser Security Authentication
Encryption
Malware (Malicious Software)
Virus Detection and Prevention
Spyware and Virus Removal
Updates and Patches
Locking Your Computer
Typosquatting

Protecting Company Resources
Firewalls
Security-Related Ethical and Legal Issues
Legal Protection

Internet Services and Tools for Business
Internet Resource Tools
Mass E-Mail and Texting Services
List Servers
File Transfer Protocol (FTP)
Managing Downloaded Files
Virtual Network Computing (VNC)
Remote Desktop Connection
Peer-to-Peer Networks
Troubleshooting Using TCP/IP Tools
Open-Source Development
Proprietary Software and EULAs
Software Patents
These Are Sensitive Files

IT Project and Program Management
Overview of IT Project and Program Management
Resources for Technical Data
Project Management Fundamentals
Project Management Skills
Project Management Phases
The Project Triangle
Project Management Software
Creating Project Schedules
Documenting Projects
Planning and Scheduling Meetings
Browsers in the Business World
Reviewing Projects
Quality Assurance
Business Implications of IT Projects
Project Management Institute (PMI)
Program Management Concepts
We Need an Intranet!

Target Audience
All students preparing to enter or continue in the workforce can benefit from the CIW Internet Business Associate course and/or certification:

- High school students
- College students
- Technical/trade school students

Professionals in all industries can benefit from the CIW Internet Business Associate course and/or certification:

- IT professionals
- Healthcare professionals
- Legal professionals
- Marketing professionals
- Graphic artists
- Business professionals

Job Responsibilities
Understand the common core of Internet knowledge, and apply the foundation skills required for further specialization.

Prerequisites
No prior experience using the Internet, developing Web pages or configuring networks is necessary. However, students should be familiar with an operating system such as Microsoft Windows 7 before taking this course. The CIW Web Foundations courseware does not provide entry-level computer literacy. Rather, it builds upon computer literacy training and certifications such as Microsoft Office Specialist (www.microsoft.com).
Site Development Associate teaches you essential Web page development skills. You will learn to develop Web sites using Hypertext Markup Language version 5 (HTML5) and Cascading Style Sheets (CSS). You will learn to write code manually, as well as use graphical user interface (GUI) authoring tools. You will also learn to insert images, create hyperlinks, and add tables, forms, video, and audio to your Web pages.

In addition to learning about HTML5 and CSS coding, you will learn how to use HTML5 Application Programming Interfaces (APIs) to extend the functionality of Web pages, such as geolocation, drag-and-drop, canvas, and offline Web applications. Other topics include validating your HTML code, recognizing the importance of search engine optimization (SEO), using style sheets extensively to format Web page content, and implementing fundamental design concepts. Throughout the course, you will learn how Web sites are developed as managed projects. You will also identify e-commerce solutions and relate Web site development to business goals.

Site Development Associate provides an introduction to tasks, job roles and careers in Web development. This course will teach you to work as a productive part of a Web site development team. Hands-on labs include real-world scenarios based on a previously live version of the Habitat for Humanity site. Note that students will build prototype pages using Habitat for Humanity content. This content is provided by Habitat for Humanity with permission to use it in labs teaching site development skills. The prototype pages that students build do not necessarily represent, duplicate or simulate the current live Habitat for Humanity Web site, which can be visited at www.habitat.org.

Topics

### Markup Language and Site Development Essentials
- Creating Web Pages
- Mobile and Cloud Issues
- Text Editors and Markup Languages
- Graphical User Interface (GUI) Editors
- History of Markup Languages
- The HTML Web Development Trifecta: HTML5, CSS and JavaScript
- Web Site Development Principles
- Hosting and Web Service Providers
- The Habitat for Humanity Web Site

### HTML5 Coding
- Introduction to Using HTML Elements and Markup Tags
- Document Structure Tags
- Web Site File Structure
- Preparing Your Development Environment
- Paragraph Formatting and Block-Level Elements
- Text-Level Elements
- Lists
- Good Coding Practice

### Cascading Style Sheets (CSS) and Graphical Elements
- Cascading Style Sheets (CSS)
- Separating Content in HTML Images in Web Pages
- HTML Entities
- Specifying Colors

### Page Colors and Backgrounds
- Specifying Font Information
- Web Design Issues
- HTML5 and Older Browsers

### Hyperlinks
- Introduction to Hyperlinks
- The Anchor Element
- Creating Local Hyperlinks
- Creating External Hyperlinks
- Using Images as Hyperlinks
- Creating Internal Links
- Managing Hyperlinks

### HTML Tables
- Introduction to HTML Tables
- CSS Properties for All Table Elements
- Table and Data Alignment Options
- Height and Width of Table Elements
- Column and Row Spanning
- HTML Tables vs. CSS Page Structure

### Web Forms
- Introduction to Web Forms
- Web Forms and CGI
- HTML5 and Forms
- Basic Tags for Creating Web Forms
- Web Form Fields

### Video, Audio and Image Techniques
- Introduction to Web Video, Audio and Image Techniques
- The <video> Element
- The <audio> Element

### Extending HTML
- Extending HTML
- Server-Side and Client-Side Languages
- Server-Side Languages
- Client-Side Languages
- Dynamic HTML (DHTML)
- Document Object Model (DOM)
- HTML5 APIs
- Canvas
- Offline Web Application
- Geolocation
- Drag-and–Drop Functionality
- Web Application Frameworks
- Connecting to a Database

### GUI HTML Editors and Mobile Web Sites
- Introduction to GUI HTML Editors
- Types of GUI Editors
- GUI HTML Editor Functionality
- Creating Web Pages with a GUI Editor
- HTML Text Editors vs. GUI Editors
- Previewing Pages and Validating Code
- Web Site Publishing
Target Audience

Students and professionals who are interested in Web site development can benefit from the CIW Site Development Associate course and/or certification:

- IT professionals
- Marketing professionals
- Graphic artists
- Web site designers

Job Responsibilities

Understand the common core of Internet knowledge, and apply the foundation skills required for further specialization.

Prerequisites

No prior experience using the Internet, developing Web pages or configuring networks is necessary. However, students should be familiar with an operating system such as Microsoft Windows 7 before taking this course. The CIW Web Foundations courseware does not provide entry-level computer literacy. Rather, it builds upon computer literacy training and certifications such as Microsoft Office Specialist (www.microsoft.com).
Web Foundations Series
Network Technology Associate

*Network Technology Associate* teaches essential networking technologies and skills, including TCP/IP, stable network creation, wireless networking, mobile devices and network troubleshooting. You will learn to use various network components and protocols that enable users to share data quickly and easily. You will explore the different types of transmission media, and you will learn how network architecture and topologies provide for efficient and secure communication. In addition, you will learn about the OSI reference model and its relationship to packet creation, and you will compare and contrast the OSI model with the Internet architecture model.

You will study the functions, features and technologies associated with Internet services, such as cloud computing. You will learn about the advantages and disadvantages of Bring Your Own Device (BYOD), the growing trend of employees bringing their personal mobile devices to work. BYOD policies and enforcement strategies will also be covered.

You will learn about the benefits of implementing a Content Management System (CMS). You will also achieve competency in performing basic hardware and operating system maintenance procedures. In addition, you will study mobile computing devices and mobile operating systems.

You will also learn about the importance of routing, and you will explore IP addressing, IP address classes and subnet masks. Finally, you will explore essential network security concepts, Internet-based challenges facing today’s users, and methods you can use to secure networks and network transmissions, including authentication, encryption and firewalls.

### Topics

<table>
<thead>
<tr>
<th>Introduction to Networking</th>
<th>Hardware and Device Connectivity</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overview of Networks and Protocols</td>
<td>Introduction to Hardware and Device Connectivity</td>
</tr>
<tr>
<td>Telephony and Convergence</td>
<td>Motherboard</td>
</tr>
<tr>
<td>Networking</td>
<td>Storage Devices</td>
</tr>
<tr>
<td>Networking Evolution</td>
<td>Network Interface Card (NIC)</td>
</tr>
<tr>
<td>Client/Server Model</td>
<td>Optical Discs</td>
</tr>
<tr>
<td>Network Operations Center (NOC)</td>
<td>Device Connectivity</td>
</tr>
<tr>
<td>Networking Categories</td>
<td>System Management</td>
</tr>
<tr>
<td>Network Topologies</td>
<td>Preventive Maintenance</td>
</tr>
<tr>
<td>Network Operating System</td>
<td>Software Troubleshooting</td>
</tr>
<tr>
<td>Microsoft Windows Servers</td>
<td></td>
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<tr>
<td>UNIX/Linux</td>
<td></td>
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<tr>
<td>The Need for Protocols</td>
<td></td>
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<tr>
<td>OSI Reference Model</td>
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<tr>
<td>Data Encapsulation</td>
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<td>Packets</td>
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<td>OSI/RM Protocol Examples</td>
<td></td>
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<tr>
<td>Transmission Control</td>
<td></td>
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<tr>
<td>Protocol/Internet Protocol (TCP/IP)</td>
<td></td>
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<tr>
<td>Binding Protocols</td>
<td></td>
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<tr>
<td>Local Area Network (LAN)</td>
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<td>Wide Area Network (WAN)</td>
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<tr>
<td>Internet Exchange Point (IXP)</td>
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</tbody>
</table>

<table>
<thead>
<tr>
<th>Networking and Standards</th>
<th>Internet Services</th>
</tr>
</thead>
<tbody>
<tr>
<td>Overview of Networking Components</td>
<td>Overview of Internet Services</td>
</tr>
<tr>
<td>Common Network Components</td>
<td>Cloud Services</td>
</tr>
<tr>
<td>Transmission Media</td>
<td>Real-World Case Study: Internet Servers</td>
</tr>
<tr>
<td>Wireless Network Technologies</td>
<td>Choosing Web Server Products</td>
</tr>
<tr>
<td>Transmission Types</td>
<td>Content Management System (CMS)</td>
</tr>
<tr>
<td>IEEE LAN Standards</td>
<td></td>
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<td>Carrier Systems</td>
<td></td>
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<tr>
<td>Virtualization</td>
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<tr>
<th>Connecting to the Internet</th>
<th>Internet Services</th>
</tr>
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<tbody>
<tr>
<td>Introduction to Connecting to the Internet</td>
<td>Overview of Internet Services</td>
</tr>
<tr>
<td>Mobile Computing</td>
<td>Cloud Services</td>
</tr>
<tr>
<td>Mobile Devices and Cloud Computing</td>
<td>Real-World Case Study: Internet Servers</td>
</tr>
<tr>
<td>Configuring a Wireless Network</td>
<td>Choosing Web Server Products</td>
</tr>
<tr>
<td>Fourth-Generation (4G) Wireless TCP/IP</td>
<td>Content Management System (CMS)</td>
</tr>
<tr>
<td>Internet Architecture</td>
<td></td>
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<tr>
<td>Internet Protocols</td>
<td></td>
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<td>Demultiplexing</td>
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<tr>
<td>Introduction to Routing</td>
<td></td>
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<tr>
<td>Routing Protocols</td>
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<td>Port Numbers</td>
<td></td>
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<tr>
<td>Internet Protocol Version 4 (IPv4)</td>
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<tr>
<td>Internet Protocol Version 6 (IPv6)</td>
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<tr>
<td>Configuring TCP/IP</td>
<td></td>
</tr>
<tr>
<td>Diagnostic Tools for Internet Troubleshooting</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Network and Cloud Security Risks</th>
<th>Security Zones</th>
</tr>
</thead>
<tbody>
<tr>
<td>Importance of Network Security</td>
<td></td>
</tr>
<tr>
<td>Bring Your Own Device (BYOD)</td>
<td></td>
</tr>
<tr>
<td>Real-World Case Study</td>
<td></td>
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<tr>
<td>Cloud Security Threats</td>
<td></td>
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<tr>
<td>Cloud Disaster Recovery</td>
<td></td>
</tr>
<tr>
<td>Malware (Malicious Software)</td>
<td></td>
</tr>
<tr>
<td>Overview of Network Attack Types</td>
<td></td>
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<tr>
<td>Defeating Network Attacks</td>
<td></td>
</tr>
<tr>
<td>Authentication</td>
<td></td>
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<tr>
<td>Encryption</td>
<td></td>
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<tr>
<td>Firewalls</td>
<td></td>
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<tr>
<td>Security Zones</td>
<td></td>
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<tr>
<td>Virtual Private Network (VPN)</td>
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<td>Security Audit</td>
<td></td>
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<tr>
<td>Other Security Threats</td>
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