*technology in action*

Chapter 4

application software:   
programs that let you work and play

# ChAPTER REVIEW

**Buzz Words/Word Bank**

|  |  |  |
| --- | --- | --- |
| application software | integrated software | spreadsheet |
| beta versions | productivity software | system requirements |
| freeware | shareware | system software |
| integrated help | software piracy | templates |
| illustration software | software suite | wizards |
| image-editing software | speech-recognition software | word processing |

**Instructions:** Fill in the blanks using the words from the Word Bank above.

Roxanne is happy. Her aunt is upgrading to a newer computer and is giving Roxanne her old one. Roxanne has just enrolled in college and knows she’s going to need at least a(n) **(1) word processing** program to help her write papers and a(n) **(2) spreadsheet** program to help her keep track of expenses while at school. Because both these software applications are part of a larger group of applications called **(3) integrated software**, she knows she can buy them as a group. She’s been told that it’s cheaper to buy them as a(n) **(4) software suite** than to buy them individually. Because she knows she’ll need the stable, tested versions of the software, she cannot get by using the **(5)** **beta versions** of the program.

Because she’s not a great typist, Roxanne is interested in **(6) speech-recognition software** that will convert her dictated words into typed text. As a graduation present, Roxanne received a new digital camera. She needs to install the **(7) image-editing software** that came with her camera to edit and manage her digital pictures. Although she’s used the software a couple of times on her parents’ computer, she is still glad for the **(8) integrated help** feature to assist her with specific feature questions and the **(9) wizards** that provide step-by-step guides to help her do things.

Roxanne especially likes the decorative preformatted **(10) templates** she can use to insert pictures and make them seem professional. She also knows of some **(11) freeware** games she can download without cost from the Internet and other **(12) shareware** programs that she could try but eventually pay for. There are some really useful utility programs she found under the category of **(13) system software** programs that she can download for no charge and would like to install and try out. It’s tempting for her to borrow software from her friends, but she knows that it’s considered **(14) software piracy**. She also knows before installing any of the programs she must check the **(15) system requirements** to determine if the software is compatible with her system as well as whether the system has enough resources to support the software.

**Self-Test**

**Instructions:** Answer the multiple choice and true/false questions below for more practice with key terms and concepts from this chapter.

**MULTIPLE CHOICE**

1. Application software
   1. runs the computer and coordinates instructions.
   2. helps maintain the resources of the operating system.
   3. is only productivity software.
   4. is used to perform everyday tasks.

ANSWER: D

1. Which of the following is NOT an example of a software suite?
   1. Microsoft Office
   2. Microsoft Works
   3. WordPerfect Office X3
   4. None of the above are examples of a software suite.

ANSWER: B

1. An integrated software program is
   1. a stand-alone program developed to work exclusively for one company.
   2. an application designed specifically for a particular business or industry.
   3. several individual application programs bundled together.
   4. a single program that includes the most commonly used tools of several applications.

ANSWER: D

1. Most editions of productivity software suites generally include
   1. word processing, spreadsheet, and Internet browser software.
   2. spreadsheet, database, and virus protection software.
   3. word processing, spreadsheet, and presentation software.
   4. spreadsheet, personal information manager, and file compression software.

ANSWER: C

1. The type of software you would use to help you with writing checks and managing your budget is
   1. financial planning software.
   2. database software.
   3. spreadsheet software.
   4. project management software.

ANSWER: A

1. What software is used to layout and design publications?
   1. Word processing software
   2. Desktop publishing software
   3. Computer-aided design software
   4. All of the above

ANSWER: B

1. ESRB is responsible for providing
   1. licensing of entertainment software.
   2. standards for educational software.
   3. ratings for game software.
   4. evaluations of edutainment software.

ANSWER: C

1. Which of the following statements is true?
   1. MP3 files contain video data.
   2. MP3 files can be played using a variety of software programs
   3. MP3 files are smaller than most other audio files
   4. Only B and C are true

ANSWER: D

1. A good practice before installing any software on your system is to
   1. check your hard drive to make sure there is room for the new program.
   2. create a restore point if you are using Windows XP.
   3. read all the manuals and support instructions that came with your equipment.
   4. All of the above are good practices.

ANSWER: D

1. Once you buy a software program you can
   1. install it on only one computer.
   2. install it on all computers in your home.
   3. lend it to your friends as long as they are using it for academic purposes only.
   4. distribute the software only as agreed to by the licensing terms.

ANSWER: D

**TRUE/FALSE**

**False** 1. Microsoft Works is a bundled package of word processing, spreadsheet, database, and presentation software applications.

**False** 2. Video editing software is too complex for home users.

**False** 3. The best way to delete a program you no longer want on your system is to delete the icon from the Start menu.

**False** 4. Shareware software is a form of open-source software.

**True** 5. FAQs are a good way to get help for common problems.

**Critical Thinking Questions**

**1. Software Ethics 1**

The cost of new software applications can be prohibitively high. You need to do a project for school that requires the use of a software application you don’t own, but your roommate has a copy that her dad gave her from his work. She is letting you install it on your machine.

a. Is it okay for you to borrow this software?

b. Would your answer to the preceding question be different if you uninstalled the application after you were finished using it?

c. Would the answer to the preceding question be different if the software was on the school’s network and you could copy it from there?

Many students may feel that they are helping one another by swapping software. They find that software prices are prohibitively high, and believe that, as students, they should not pay such high prices. A workaround to this is by providing sites where they can buy software at student prices with proof of enrollment. Institutions may also want to explore participating in programs such as Microsoft’s MSDNAA (Microsoft Software Developers Network Academic Alliance) program, which allows institutions to join for a reasonable annual membership and provide software for their students to borrow. Students should also be encouraged to read the End User Licensing Agreement (EULA), since some software applications may be used on more than one computer.

**2. Software Ethics 2**

Currently, there is no true system to check for illegal installations of software programs. What kind of program or system do you think could be developed to do this type of checking? Who would pay to develop, run, and maintain the program: the developers or the software users?

*The most obvious way to do checks for legal software is via the Internet. Perhaps when the software launches, an automatic Web-check could be performed by the manufacturer or an appointed agent.*

**3. Categories of Software**

This chapter has organized the many software applications into a variety of categories. Which category (or categories) of software do you feel has the need for a new, breakthrough product? What needs are there in your work or hobbies that existing software applications do not yet address?

Answers may vary widely depending on students’ exposure to various software applications. It would be interesting to have a program that could help diagnose medical ailments from home, for example test for lung function without having to visit the specialist’s office. The test results could be sent over the Internet for interpretation.

**4. The Pros and Cons of Software**

During the past 10 years, many tasks have moved from professional, expensive environments to home desktops. Image editing and video editing were once available only to expensive professional studios but now can be done at home. Résumés were once taken to professional typesetters, but popular word processors can now do the work at home. What are the positive and negative impacts of this pattern for consumers? Does it offer consumers more power, opportunity, and control, or impose more pressures to purchase software and learn new skills?

We now have more power as consumers, but also more pressure to become subject matter experts. This is a mixed blessing.

**5. Software for the Hearing and Visually Impaired**

The World Wide Web Consortium (W3C) currently has an initiative to ensure that all Web pages are accessible to everyone, including those with visual and hearing impairments. Currently, software such as the freeware program Watchfire WebXACT (webxact.watchfire.com) can test Web pages to determine whether alternatives to auditory and visual Web content are available, such as closed captioning for auditory files and auditory files for visual content. WebXACT generates a report that identifies and prioritizes Web site areas that do not meet the guidelines.

1. Can you think of any other unique uses of software that might make the world a better place for those with visual and hearing impairments?
2. Pick a favorite Web site and see how it checks out using the WebXACT software. What changes would be necessary for that Web site to conform to W3C standards?
3. How might recommendations made by the W3C also benefit people without physical limitations?

*The potential answers are limitless here. It is difficult to make a purchase online without being able to search, find prices, enter credit card information, and so on, visually. This would be a great bonus to those with disabilities.These features can also benefit Web site visitors that are not disabled. Just as audiobooks have become popular, using a text reader to listen to site content, rather than reading it, may be useful to some. Closed captioning can be beneficial in situations where viewing a site with the sound on is not possible, such as in the library or in a lab whose computers are not equipped with speakers.*

**Team Time**

**Assessing Software Needs**

*This exercise gives students a glimpse of the many different kinds of software needed to successfully run and manage a business and encourages them to think of all the different departments and systems that require software. The following rubric may be useful for grading purposes.*

| **Rubric** | **Beginning**  **1 point** | **Developing**  **2 points** | | **Proficient**  **3 points** | | **Exemplary**  **4 points** | **Score** |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Individual Effort** | There was very little effort or understanding of the topic shown. | There was evidence of effort but it lacked in preparation and understanding. | | Clear learning on the topic has occurred. | | A sound understanding of the topic was exhibited with enthusiasm and creativity. |  |
| **Team Effort** | Team members did not function as a group when given the opportunity. There was only individual work with no evidence of collaboration. | Team members had some major problems working as a group. There was little collaboration and teamwork evident. | | The team members mostly worked well together, with few problems. There could have been improvement in the level of teamwork that was utilized. | | The team worked as a cohesive unit. There was mature collaboration, compromise, and discussion evident at all times. |  |
| **Final Product** | The final presentation had major factual, grammatical, spelling, and formatting errors. It seemed rushed and incomplete. | The final presentation had factual, grammatical, spelling, or formatting errors but was complete. | | The final presentation was a carefully developed product with few factual, grammatical, spelling, or formatting errors. | | The presentation was developed with care and creativity making it interesting, polished, and error-free. |  |
| **Instructor Feedback** | Little or no attempt was made to receive or incorporate feedback from the instructor. | Feedback was received, but none of the suggestions were incorporated into the presentation. | | Feedback was received and some suggestions were incorporated into the presentation. | | Feedback was received and the suggestions were incorporated into the presentation. |  |
| **Evaluation** | 0 points  No assessments were completed and handed in to the instructor. | | 1 point  One assessment was completed and handed in to the instructor. | | 2 points  All assessments were completed and handed in to the instructor. | |  |

**ACTIVE HELPDESK**

These exercises are designed to provide the student with an interactive experience that will help them to extend their knowledge of topics in this chapter. The student plays the “role” of a Helpdesk analyst and provides answers to *commonly* asked questions in a rich, simulated online experience. Helpdesk calls can be found on the Train and Assess IT Web site, through your online course, or on the Student CD. After successfully completing the Helpdesk call, students will be able to access the Helpdesk Cheat Sheet, which summarizes the key points in each call.

The Helpdesk calls related to this chapter are:

* Choosing Software
* Buying and Installing Software

***Choosing Software******Helpdesk Cheat Sheet***

***A. Entertainment Software***

*Entertainment software**provides users with entertainment. Because they incorporate sophisticated multimedia, these programs have certain RAM, hard disk, sound/video cards, speaker, and CD/DVD drive requirements. Virtual reality programs require special equipment such as goggles. The**Entertainment Software Rating Board rating system suggests an age-appropriate rating for computer games.*

***B. MP3 Software***

*MP3 programs fall into one of the following categories: (1) MP3 recording software, (2) ripping software, (3) MP3 burners, (4) encoding and decoding/format conversion, and (4) MP3 file editors.*

***C. Web Page Authoring Software***

*Web page authoring software**allows users to design interesting and interactive Web pages without knowing HTML code. Microsoft FrontPage and Adobe Dreamweaver are two of the leading programs that professionals and casual Web page designers use. In some Office applications, you can save a file as a Web page.*

***D. Desktop Publishing Software***

*Desktop publishing software allows users to design and lay out complex publications. Desktop publishing programs offer a variety of tools with which you can format text and graphics.*

***E. Image-Editing, Painting, and Video-Editing Software***

*1. Image-editing software enables you to edit photos and other images.*

*2. Painting software is used to modify photos but includes a set of painting tools such as brushes, pens, and artistic mediums that allow you to create images as well.*

*3. Digital video–editing software allows users to edit and manipulate digital video.*

***F. Drawing Software***

*Drawing software is used to create technical diagrams or creative illustrations. Creative programs such as Adobe Illustrator allow you to create professional-quality illustrations. Microsoft’s Visio is used to create technical drawings, maps, diagrams, flowcharts, and project schedules. Computer-aided design programs are a form of 3-D modeling engineers use to create automated designs, technical drawings, and model visualizations.*

***G. Educational and Reference Software***

*Educational software refers to software that offers some form of instruction or training. Applications that act as sources for reference materials are referred to collectively as reference software. Course management software programs provide traditional classroom tools such as calendars and grade books over the Internet.*

***Buying and Installing Software******Helpdesk Cheat Sheet***

***A. Freeware and Shareware***

*Freeware is copyrighted software that you can use for free. Some software developers offer beta versions of their software free of charge. Beta versions are still under development. Software that allows users to run it for free for a limited time is called shareware. You must exercise caution when downloading freeware and shareware as they can contain bugs or viruses.*

***B. Discounted Software***

*Students may be able to buy software that is no different from regularly priced software at prices that are sometimes substantially less than general consumer prices.*

***C. Software System Requirements***

*Every**software program has a set of system requirements that specify the recommended standards for the operating system, processor, primary memory, and hard drive capacity.*

***D. Installing Software***

*To install software, you insert the program file CD into your computer. For most programs, an Installation Wizard automatically opens, whose steps you should follow. When you download software, everything you need to install and run the program is in one file that has been compressed (or zipped) to make the process quicker. For the most part, these downloaded files “unzip” themselves and automatically start the setup program.*

***E. Uninstalling Software***

*A software application contains many different files in addition to the main file. By just deleting the main program file, you are not ridding your system of the other programs that go with it. Most programs have an Uninstall Program icon in the main program file. Using this icon will clear out most of the associated programs as well as the main program itself.*

***E. Getting Help with Software***

*If you need help with software, there are several different resources you can access, including: (1) frequently asked questions (FAQ) pages, (2) online help and support, (3) help or screen tips from the Office Assistant, (4) the Help menu, (5) online tutorials or program tours, and (6) the Microsoft Knowledge Base (http://support. microsoft.com).*