



IT Chapter 6: Laptops & Portable Devices

Online Study Questions

| CUR | Question | Answer |
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| 6.0 | Introduction | |
| | 1. What laptop established the form factor for all modern laptops? (graphic) | |
| 6.1 | Describe laptops and other portable devices | |
| | 2. What cell phones called that have many built-in PDA capabilities? | |
| 6.1.1 | Identify some common uses of laptops | |
| | 3. What are two reasons that a laptop would be a better choice than a desktop computer? | |
| 6.1.2 | Identify some common uses of PDAs and Smartphones | |
| | 4. What is an electronic personal organizer with tools to help organize information? | |
| | 5. What device combines cell phone and computer functions in a single, handheld device? | |
| 6.1.2 | Worksheet | |
| 6.2 | Identify and describe the components of a laptop | |
| | 6. What type of display screen is in the lid of a laptop? | |
| 6.2.1 | Describe the components found on the outside of the laptop | |
| | 7. Why do laptops and desktops use the same types of ports? | so that _____ can be _____ |
| | 8. What indicates Bluetooth, battery and standby mode? | _____ LEDs on the top of the laptop |
| 6.2.1 | Explore the Virtual Laptop | |
| 6.2.2 | Describe the components found on the inside of the laptop | |
| | 9. What type of design do laptops have? | |
| | 10. What type of monitor is built-in on a laptop? | |

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| | 11. How can you change between a laptop display and the desktop monitor? | A _____ on the laptop keyboard toggles between the two monitors |
| | 12. What tells the CPU to conserve power by extinguishing the backlight and turning off the LCD? | |
| | 13. What should you check if you open the laptop and the screen remains dark? | |
| 6.2.2 | Explore the Virtual Laptop - Keyboard | |
| 6.2.3 | Describe the components found on the laptop docking station | |
| | 14. What do you have access to when you plug the laptop into the base station? | power and the attached peripherals |
| | 15. What is the difference between a docking station and a port replicator? | Port replicators are usually _____ than docking stations and do not have _____ or PCI slots |
| | 16. On the back of the docking station are two laptop ports that are used primarily for communication and network connectivity? | |
| 6.2.3 | Worksheet – Docking Stations | |
| | Optional Activity: Virtual Laptop Docking Station | |
| 6.3 | Compare and contrast desktop and laptop components | |
| | 17. Which type of computer has standardized components? | Desktop laptop |
| | 18. Which type of computer usually has components that have a standard form factor? | Desktop laptop |
| | 19. Which type of computer has proprietary components? | Desktop laptop |
| 6.3.1 | Compare and contrast desktop and laptop motherboards | |
| | 20. What is the major difference between desktop and laptop motherboards? | Desktop motherboards have standard _____ _____ |
| | | The standard size and shape allow motherboards from different manufacturers to be _____. |

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| | | _____ motherboards vary by manufacturer and are _____. |
| 6.3.2 | Compare and contrast desktop and laptop processors | |
| | 21. Why do laptop processors use CPU throttling to modify the clock speed? | to reduce power consumption and _____. |
| 6.3.3 | Compare and contrast desktop and laptop power management | |
| | 22. What recharges a laptop battery? | |
| | 23. What are the two methods of power management? | <ul style="list-style-type: none"> • Advanced Power Management (APM) • Advanced C_____ and Power Interface (ACPI) |
| | 24. What is the current standard? | ACPI |
| | 25. Which power management system is controlled by the operating system? | APM ACPI |
| 6.3.4 | Compare and contrast desktop and laptop expansion capabilities | |
| | 26. What are the four ports used on a desktop to attach peripheral devices? | |
| | | parallel |
| | | |
| | | FireWire |
| | 27. What two standards make it possible to connect and remove external components without the need to power off the system? | |
| | 28. What do laptops use the PC card slot for? | to connect to peripheral devices using the _____ standard. |
| | 29. | |
| | 30. What are four devices that connect using PC Cards? | |
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| | | Hard drives |
| | | Network cards |
| | 31. What is the standard for PC Cards? | |
| | 32. What PC card has 34-pin and 54- | |

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| | pin configurations? | |
| 6.4 | Explain how to configure laptops | |
| 6.4.1 | Describe how to configure power settings | |
| | 33. What is the current range in hours that a laptop battery can last without recharging? | |
| | 34. What four conditions are affected by configuring power settings in BIOS? | • System states |
| | | • Battery and AC modes |
| | | • Thermal _____ |
| | | • _____ PCI bus power management |
| | 35. In Windows XP, where do you enable the ACPI power management to allow the OS to configure all of the power management states? | |
| | 36. How do you configure the power settings? | click: Start > Control Panel > _____ Options |
| | 37. What are a collection of settings that manage the power usage of the computer called? | |
| | 38. Which two devices can be individually configured to power off after a laptop has been idle for a given period of time? | |
| | 39. What are your two options if you do not want to completely shutdown the laptop? | |
| | 40. Which mode conserves battery power, but allows the end-user to power on quickly? | Standby Hibernation |
| | 41. Which mode saves documents and applications to a temporary file on the hard drive? | Standby Hibernation |
| | 42. Which warning will initiate a forced standby, hibernate, or shut down? | Low Battery Alarm |
| | | _____ Battery Alarm |
| | Worksheet: ACPI Standards | |

| 6.4.2 Describe the safe installation and removal of laptop components | |
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| 43. True/False? Always disconnect power and remove the battery before installing or removing laptop components that are not hot-swappable. | True False |
| 44. What are the four steps to replace a laptop battery? | <ol style="list-style-type: none"> 1. Move the battery lock to the _____ position. 2. Hold the _____ in the unlock position and remove the battery. 3. _____ the battery. 4. Make sure that both battery levers are _____ |
| 45. What is another name for laptop expansion memory? | |
| 46. What is meant by a laptop device being hot-swappable? | Computer does not need to be _____ in order to install device |
| 47. Which three internal laptop components may be designed as a hot-swappable device? | the PC Card |
| | USB devices |
| 48. Are the following three devices hot-swappable, or NOT hot swappable on some laptops? (1) internal hard drive, (2) RAM (3) battery | Hot swappable NOT hot swappable |
| Optional Activity: Virtual Laptop Components and Devices | |
| 6.5 Compare the different mobile phone standards | |
| 49. When cell phones first were introduced, what was the standard? | Analog digital |
| 50. Today, what are most cell phone standards? | Analog digital |
| 51. When was the first generation of cell phones introduced? | |
| 52. When using digital signals, what do they convert the voice to? | |

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| | 53. What is the generation of cell phones called that switched from analog to digital standards? | |
| | 54. What standards allowed cell phones to send and receive text, photos, and video? | |
| 6.6 | Identify common preventive maintenance techniques for laptops & portable devices | |
| | 55. True/False? Spilling liquid or dropping debris onto the keyboard cannot cause severe internal damage. | True False |
| 6.6.1 | Identify appropriate cleaning procedures | |
| | 56. What device should be cleaned with a soft, lint-free cloth that is lightly moistened with water? | |
| | 57. What should be used to clean the vents? | |
| | 58. True/False? Do not spray cleaning solution directly onto the LCD display | True False |
| 6.6.2 | Identify optimal operating environments | |
| | 59. Where should you store your laptop? | |
| | 60. What is the ideal room temperature for a laptop? | |
| 6.7 | Describe how to troubleshoot laptops and portable devices | |
| | 61. True/False? Because many portable devices change rapidly in design and functionality, portable devices are often more expensive to repair than to replace | True False |
| 6.7.1 | Review the troubleshooting process | |
| | 62. What type of questions should the technician ask to gather the most information from the customer? | |
| 6.7.2 | Identify common problems and solutions | |
| | 63. Your laptop LCD screen will not show anything. You think a projector was attached to it. What can you do to show the laptop screen? | Disconnect external monitors and use the _____ keys to activate the LCD |
| Worksheet:: Research Laptop Problems Research laptop issues | | |
| 6.8 | Summary | |
| QUIZ | 06: Online Quiz (9 questions) | |