

TEST BANK

Copyright 2014
**ELECTRONIC
COMMERCE**

8E



GARY P. SCHNEIDER

ch02

True/False

Indicate whether the statement is true or false.

- 1. Computer networks and the Internet form the basic technology structure that underlies all electronic commerce.
- 2. The USENET was the earliest of the networks that combined to become what we now call the Internet.
- 3. E-mail was born in 1972 when a researcher wrote a program that could send and receive messages over the network.
- 4. In 1989, the NSF permitted two commercial e-mail services, MCI Mail and CompuServe, to establish limited connections to the Internet for the sole purpose of exchanging e-mail transmissions with users of the Internet.
- 5. The Web is software that runs on computers that are connected to the Internet.
- 6. An HTML document is similar to a word-processing document in that it specifies how a particular text element will appear.
- 7. A network of computers that are located close together—for example, in the same building—is called a local area network.
- 8. IP addresses appear as five numbers separated by periods.
- 9. A domain name is a set of words assigned to specific IP addresses.
- 10. The organization for managing domain names and coordinating them with their IP addresses registrars is known as the Internet Corporation for Actualized Names and Nuances.
- 11. The set of rules for delivering Web page files over the Internet are in a protocol called the HTTP (Hypertext Transfer Protocol).
- 12. The acronym SMTP is short for Simple Markup Tracer Protocol.
- 13. IMAP is a newer e-mail protocol that performs the same basic functions as POP, but includes additional features.
- 14. The POP protocol provides support for MIME.
- 15. HTML is a meta language because users can create their own markup elements that extend the usefulness of XML.
- 16. SGML offers a system of marking up documents that is independent of any software application.
- 17. The term cascading means that designers can apply many style sheets to the same Web page, one on top of the other.
- 18. Although fax, e-mail, and overnight carriers have been the main communications tools for business for many years, extranets can replace many of them at a lower cost.
- 19. Intranets are not compatible with the Internet.
- 20. The Internet provides a high degree of security in its basic structure.
- 21. The “virtual” part of VPN means that the connection seems to be a temporary, internal network connection, but the connection is actually permanent.

- ___ 22. Establishing VPNs does not require leased lines.
- ___ 23. Although an extranet is a VPN, not every VPN is an extranet.
- ___ 24. The higher the bandwidth, the faster data files travel and the faster Web pages appear on your screen.
- ___ 25. Asymmetric connections provide the same bandwidth for each direction.

Multiple Choice

Identify the choice that best completes the statement or answers the question.

- ___ 26. HTML was developed by ____.
 - a. ARPANET
 - b. NSF
 - c. Ted Nelson
 - d. Tim Berners-Lee
- ___ 27. ___ was the first Web browser that became widely available for personal computers.
 - a. Mosaic
 - b. Netscape
 - c. Internet Explorer
 - d. CompuServe
- ___ 28. The combination of telephone lines and the closed switches that connect them to each other is called a(n) ____.
 - a. LAN
 - b. WAN
 - c. circuit
 - d. pathway
- ___ 29. On a packet-switched network, files and e-mail messages are broken down into small pieces, called ____.
 - a. messages
 - b. pieces
 - c. circuits
 - d. packets
- ___ 30. When packets leave a network to travel on the Internet, they must be translated into a standard format. ___ usually perform this translation function.
 - a. Switches
 - b. Bridges
 - c. Routers
 - d. Routing algorithms
- ___ 31. A(n) ___ is a collection of rules for formatting, ordering, and error-checking data sent across a network.
 - a. routing algorithm
 - b. backbone router
 - c. protocol
 - d. packet
- ___ 32. Routers and the telecommunications lines connecting them are collectively referred to as ____.
 - a. backbone routers
 - b. Internet routers
 - c. an asynchronous backbone
 - d. the Internet backbone
- ___ 33. ___ determine how the sending device indicates that it has finished sending a message, and how the receiving device indicates that it has received the message.
 - a. Routers
 - b. Bridges
 - c. Protocols
 - d. Adapters
- ___ 34. In networking applications, an 8-bit number is often called a(n) ____.
 - a. octet
 - b. netbit
 - c. piconet
 - d. bit
- ___ 35. Network engineers have devised a number of stopgap techniques to stretch the supply of IP addresses. One of the most popular techniques is ____.
 - a. subnetting
 - b. subletting
 - c. subIPing
 - d. piconetting
- ___ 36. A computer called a(n) ___ converts private IP addresses into normal IP address when it forwards packets from those computers to the Internet.
 - a. routing algorithm device
 - b. Network Address Translation device
 - c. subnet translation device
 - d. private network device

- ___ 37. IPv6 uses a(n) ___ number for addresses.
- a. 32-bit
 - b. 56-bit
 - c. 128-bit
 - d. 256-bit
- ___ 38. The ___ numbering system uses 16 digits.
- a. hexadecimal
 - b. decimal
 - c. binary
 - d. ASCII
- ___ 39. ___ are sets of words that are assigned to specific IP addresses.
- a. Domain names
 - b. URLs
 - c. Octets
 - d. Piconets
- ___ 40. The purpose of a(n) ___ is to respond to requests for Web pages from Web clients.
- a. URL
 - b. e-mail
 - c. Web server
 - d. top-level domain
- ___ 41. The combination of the protocol name and the domain name is called a(n) ___.
- a. URI
 - b. URO
 - c. URL
 - d. HTTP
- ___ 42. ___ is a set of rules for handling binary files, such as word-processing documents, spreadsheets, photos, or sound clips, that are attached to e-mail messages.
- a. IMAP
 - b. MIME
 - c. SMTP
 - d. POP
- ___ 43. ___ specifies the format of a mail message and describes how mail is to be administered on the e-mail server and transmitted on the Internet.
- a. SMTP
 - b. TCP/IP
 - c. MIME
 - d. POP
- ___ 44. A newer e-mail protocol that performs the same basic functions as POP, but includes additional features, is known as ___.
- a. IMAP
 - b. SMTP
 - c. POPI
 - d. IPOP
- ___ 45. ___ lets users create and manipulate mail folders, delete messages, and search for certain parts of a message while the e-mail is still on the e-mail computer.
- a. POP
 - b. SMTP
 - c. IMAP
 - d. MIME
- ___ 46. The early versions of ___ allowed Web page designers to create text-based electronic documents with headings, title bar titles, bullets, lines, and ordered lists.
- a. HTTP
 - b. HTML
 - c. SGML
 - d. XML
- ___ 47. The ___ tag is used to create hyperlinks in a Web document.
- a. head
 - b. anchor
 - c. title
 - d. ol
- ___ 48. A(n) ___ is an interconnected network, usually one that uses the TCP/IP protocol set, and does not extend beyond the organization that created it.
- a. Internet
 - b. extranet
 - c. intranet
 - d. ARPANET
- ___ 49. A(n) ___ is like a separate, covered commuter lane on a highway (the Internet) in which passengers are protected from being seen by the vehicles traveling in the other lanes.
- a. VPN
 - b. IP wrapper
 - c. extranet
 - d. IAP
- ___ 50. An extranet that uses public networks and their protocols to send sensitive data to partners, customers, suppliers, and employees using a system called IP tunneling or encapsulation is known as a(n) ___.

- a. public network
- b. virtual public network
- c. virtual private network
- d. private network

Completion

Complete each statement.

51. A computer _____ is any technology that allows people to connect computers to each computer.
52. The _____ is a large system of interconnected computer networks that spans the globe.
53. The part of the Internet known as the _____ is a subset of the computers on the Internet that are connected to each other in a specific way that makes them and their contents easily accessible to each other.
54. A(n) _____ is an e-mail address that forwards any message it receives to any user subscribed to the list.
55. In 1979, a group of students and programmers at Duke University and the University of North Carolina started _____, which allows anyone who connects to the network to read and post articles on a variety of subjects.
56. Usenet survives on the Internet today with over 1000 different topic areas that are called _____.
57. Internet _____ are computers that are directly connected to the Internet.
58. _____ providers sell Internet access rights directly to larger customers and indirectly to smaller firms and individuals through other companies, called ISPs.
59. A(n) _____ server is a computer that stores files written in the hypertext markup language and lets other computers connect to it and read these files.
60. Programs apply their routing algorithms to information they have stored in routing tables or _____ tables.
61. The routers connected to the Internet backbone are sometimes called _____ routers.
62. The _____ Protocol controls the disassembly of a message or a file into packets before it is transmitted over the Internet, and then controls the reassembly.
63. The _____ Protocol specifies the addressing details for each packet, labeling each with the packet's origination and destination addresses.
64. The set of rules for delivering Web pages over the Internet are collected in a protocol called the _____.
65. _____ is a meta language, which is a language that can be used to define other languages.
66. HTML and XML were derived from _____.
67. In HTML, the text elements that are related to one another are called _____ elements.
68. A(n) _____ hyperlink structure resembles conventional paper documents in that the reader begins on the first page and clicks a Next button to move to the next page in a serial fashion.

69. _____ let designers define formatting styles that can be applied to multiple Web pages.
70. An XML document is embedded within a(n) _____ document.
71. _____ tags do not specify how text appears on a Web page; the tags convey the meaning of the information included within them.
72. A(n) _____ is an intranet that has been extended to include specific entities outside the boundaries of the organization.
73. Any computer network or telecommunications network that is made available to the public is known as a(n) _____.
74. _____ is the amount of data that can travel through a communication line per unit of time.
75. Upstream bandwidth is also called _____ bandwidth.

Essay

76. As an individual packet travels from one network to another, the computers through which the packet travels determine the best route for getting the packet to its destination. Describe this process.
77. Identify the four key rules for message handling.
78. What is the difference between TCP and IP?
79. What is the difference between a public network and a private network?
80. What are the advantages of Bluetooth technology?

ch02
Answer Section

TRUE/FALSE

1.	ANS: T	PTS: 1	REF: 55
2.	ANS: F	PTS: 1	REF: 56
3.	ANS: T	PTS: 1	REF: 56
4.	ANS: T	PTS: 1	REF: 57
5.	ANS: T	PTS: 1	REF: 59
6.	ANS: F	PTS: 1	REF: 60
7.	ANS: T	PTS: 1	REF: 61
8.	ANS: F	PTS: 1	REF: 65
9.	ANS: T	PTS: 1	REF: 66
10.	ANS: F	PTS: 1	REF: 66
11.	ANS: T	PTS: 1	REF: 68
12.	ANS: F	PTS: 1	REF: 69
13.	ANS: T	PTS: 1	REF: 69
14.	ANS: T	PTS: 1	REF: 69
15.	ANS: F	PTS: 1	REF: 70
16.	ANS: T	PTS: 1	REF: 71
17.	ANS: T	PTS: 1	REF: 78
18.	ANS: T	PTS: 1	REF: 85
19.	ANS: F	PTS: 1	REF: 85-86
20.	ANS: F	PTS: 1	REF: 86
21.	ANS: F	PTS: 1	REF: 87
22.	ANS: T	PTS: 1	REF: 87
23.	ANS: F	PTS: 1	REF: 87
24.	ANS: T	PTS: 1	REF: 88
25.	ANS: F	PTS: 1	REF: 89

MULTIPLE CHOICE

26.	ANS: D	PTS: 1	REF: 59
27.	ANS: A	PTS: 1	REF: 60
28.	ANS: C	PTS: 1	REF: 62
29.	ANS: D	PTS: 1	REF: 62
30.	ANS: C	PTS: 1	REF: 62
31.	ANS: C	PTS: 1	REF: 63
32.	ANS: D	PTS: 1	REF: 63
33.	ANS: C	PTS: 1	REF: 63
34.	ANS: A	PTS: 1	REF: 65
35.	ANS: A	PTS: 1	REF: 65
36.	ANS: B	PTS: 1	REF: 65-66
37.	ANS: C	PTS: 1	REF: 66

38.	ANS: A	PTS: 1	REF: 66
39.	ANS: A	PTS: 1	REF: 66
40.	ANS: C	PTS: 1	REF: 68
41.	ANS: C	PTS: 1	REF: 68
42.	ANS: B	PTS: 1	REF: 69
43.	ANS: A	PTS: 1	REF: 69
44.	ANS: A	PTS: 1	REF: 69
45.	ANS: C	PTS: 1	REF: 69
46.	ANS: B	PTS: 1	REF: 72
47.	ANS: B	PTS: 1	REF: 77
48.	ANS: C	PTS: 1	REF: 85
49.	ANS: A	PTS: 1	REF: 87
50.	ANS: C	PTS: 1	REF: 87

COMPLETION

51.	ANS: network		
		PTS: 1	REF: 55
52.	ANS: Internet		
		PTS: 1	REF: 55
53.	ANS: World Wide Web WWW Web WWW (World Wide Web) World Wide Web (WWW)		
		PTS: 1	REF: 55
54.	ANS: mailing list		
		PTS: 1	REF: 56
55.	ANS: Usenet User's News Network		
		PTS: 1	REF: 56
56.	ANS: newsgroups		
		PTS: 1	REF: 57
57.	ANS: hosts		
		PTS: 1	REF: 58
58.	ANS: Network access		
		PTS: 1	REF: 58
59.	ANS: hypertext		

- PTS: 1 REF: 59
60. ANS: configuration
- PTS: 1 REF: 62
61. ANS: backbone
- PTS: 1 REF: 63
62. ANS: Transmission Control
- PTS: 1 REF: 64
63. ANS: Internet
- PTS: 1 REF: 64
64. ANS:
Hypertext Transfer Protocol
Hypertext Transfer Protocol (HTTP)
HTTP
HTTP (Hypertext Transfer Protocol)
- PTS: 1 REF: 68
65. ANS:
SGML
Standard Generalized Markup Language
SGML (Standard Generalized Markup Language)
Standard Generalized Markup Language (SGML)
- PTS: 1 REF: 70
66. ANS:
SGML
Standard Generalized Markup Language
SGML (Standard Generalized Markup Language)
Standard Generalized Markup Language (SGML)
- PTS: 1 REF: 70
67. ANS: hypertext
- PTS: 1 REF: 72
68. ANS: linear
- PTS: 1 REF: 76
69. ANS:
Cascading Style Sheets
CSS
CSS (Cascading Style Sheets)
Cascading Style Sheets (CSS)
- PTS: 1 REF: 78
70. ANS:
HTML

Hypertext Markup Language
HTML (Hypertext Markup Language)
Hypertext Markup Language (HTML)

PTS: 1 REF: 79

71. ANS:
Extensible Markup Language
XML
XML (Extensible Markup Language)
Extensible Markup Language (XML)

PTS: 1 REF: 82

72. ANS: extranet

PTS: 1 REF: 85

73. ANS: public network

PTS: 1 REF: 86

74. ANS: Bandwidth

PTS: 1 REF: 88

75. ANS: upload

PTS: 1 REF: 89

ESSAY

76. ANS:
The computers that decide how to best forward each packet are called routing computers, router computers, routers, gateway computers (because they act as the gateway from a LAN or WAN to the Internet) or border routers (because they are located at the border between the organization and the Internet.) The programs on the routers that determine the best path contain rules called routing algorithms. The programs apply these algorithms to information they have stored in routing tables or configuration tables. This information includes lists of connections that lead to particular groups of other routers, rules that specify which connection to use first, and rules for handling instances of heavy packet traffic and network congestion.

PTS: 1 REF: 62

77. ANS:
The open architecture philosophy developed for the evolving ARPANET, which later became the core of the Internet, included the use of a common protocol for all computers connected to the Internet and four key rules for message handling: 1) Independent networks should not require any internal changes to be connected to the network, 2) Packets that do not arrive at their destinations must be retransmitted from their source network, 3) Router computers act as receive-and-forward devices; they do not retain information about the packets that they handle, and 4) No global control exists over the network.

PTS: 1 REF: 64

78. ANS:

The TCP controls the disassembly of a message or a file into packets before it is transmitted over the Internet, and it controls the reassembly of those packets into their original formats when they reach their destinations. The IP specifies the addressing details for each packet, labeling each with the packet's origination and destination addresses.

PTS: 1 REF: 64

79. ANS:

A public network is any computer network or telecommunications network that is available to the public. The Internet is one example of a public network. A private network is a private, leased-line connection between two companies that physically connects their intranets to one another.

PTS: 1 REF: 86

80. ANS:

One major advantage of Bluetooth technology is that it consumes very little power, which is an important consideration for many devices. Another advantage is that Bluetooth devices can discover each other and exchange information automatically. For example, a person using a laptop computer in a temporary office can print to a local Bluetooth-enabled printer without logging in to the network or installing software in either device. The printer and laptop computer electronically recognize each other as Bluetooth devices and immediately can begin exchanging information.

PTS: 1 REF: 92