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Exams Take Test: ITMO440/540 Spring 2017 Final (Part A)



## Take Test: ITMO440/540 Spring 2017 Final (Part A)

### Test Information

#### Description

Instructions You have 60 minutes to complete 50 questions

Timed Test This test has a time limit of 1 hour. You will be notified when time expires, and you may continue or submit. Warnings appear when **half the time, 5 minutes, 1 minute, and 30 seconds** remain.

Multiple Attempts Not allowed. This test can only be taken once.

Force Completion Once started, this test must be completed in one sitting. Do not leave the test before clicking **Save and Submit**.

Additional Time Used: 11 minutes, 44 seconds.

### Question Completion Status:

#### QUESTION 1

4 points

Saved

\_\_\_\_\_ may be considered a form of physical protection.

- ☐ a. Worms
- ☐ b. Trojan horses
- ☐ c. Surveillance
- ☒ d. Router

#### QUESTION 2

4 points

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\_\_\_\_\_ takes an IP address in an IP datagram and translates it into the appropriate medium access control layer address for delivery on a local area network.

- ☒ a. Network Address Translation (NAT)
- ☐ b. User Datagram Protocol (UDP)
- ☐ c. Address Resolution Protocol (ARP)

A classic algorithm that calculates a least-cost path through a network is \_\_\_\_\_ algorithm.

- ☒ a. Dijkstra's least-cost
- ☐ b. Dijkstra's longest-path
- ☐ c. Turing's longest-path
- ☐ d. Dijkstra's maximum-cost

**QUESTION 4**

4 points

 Saved

Many people consider the Trojan horse to be a form of computer \_\_\_\_\_.

- ☐ a. router
- ☐ b. switch
- ☒ c. virus
- ☐ d. firewall

**QUESTION 5**

4 points

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\_\_\_\_\_ is data before any encryption has been performed.

- ☐ a. Enciphertext
- ☐ b. Ciphertext
- ☒ c. Plaintext
- ☐ d. Cryptotext

**QUESTION 6**

4 points

 Saved

The \_\_\_\_\_-switched network is most often found in networks designed to transfer computer data (such as the Internet).

- ☐ a. port
- ☐ b. circuit
- ☒ c. packet
- ☐ d. protocol

**QUESTION 7**

4 points

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A \_\_\_\_\_ is a common Internet tool used to verify if a particular IP address of a host exists and to see if the particular host is currently available.

Click Save and Submit to save and submit. Click Save All Answers to s

The wireless LAN term for a collection of multiple Basic Service Sets is \_\_\_\_.

- ☒ a. Extended Service Set (ESS)
- ☐ b. Complex Service Set (CSS)
- ☐ c. Multiple Service Set (MSS)
- ☐ d. Basic Service Set (BSS)

**QUESTION 9**

4 points

 Saved

A(n) \_\_\_\_ is the unique piece of information that is used to create ciphertext and then decrypt the ciphertext back into plaintext.

- ☒ a. encryption algorithm
- ☐ b. key
- ☐ c. IP address
- ☐ d. firewall

**QUESTION 10**

4 points

 Save Answer

A(n) \_\_\_\_ is a service from local telephone companies in which up-to-date telephone facilities at the telephone company's central (local) office are offered to business users, so that they don't need to purchase their own facilities.

- ☐ a. central office exchange service
- ☒ b. interexchange carriers (IECs or IXC's)
- ☐ c. local exchange carriers (LECs)
- ☐ d. private branch exchange (PBX's)

**QUESTION 11**

4 points

 Saved

The \_\_\_\_ standard is a 56,000-bps dial-up modem standard approved by a standards-making organization rather than a single company.

- ☒ a. V.90
- ☐ b. 802.11Q
- ☐ c. 803.1

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4 points

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Popular operating systems for microcomputers include Mac OS X, \_\_\_\_, Linux, and the various forms of Windows XP/Vista/7.

- ☐ a. OS/390
- ☒ b. Unix
- ☐ c. AS/400
- ☐ d. DEC's VMS

**QUESTION 13**

4 points

 Saved

One very common technique to attack a system is to deliver an e-mail or Web page that contains a malicious piece of code called a \_\_\_\_.

- ☐ a. mobile malicious code
- ☒ b. proxy
- ☐ c. firewall
- ☐ d. NOS

**QUESTION 14**

4 points

Save Answer

A \_\_\_\_ virus is a virus that infects a piece of executable code such as an .exe or .com file.

- ☒ a. file infector
- ☐ b. boot sector
- ☐ c. macro
- ☐ d. polymorphic

**QUESTION 15**

4 points

Save Answer

A \_\_\_\_ cipher is different from a substitution-based cipher in that the order of the plaintext is not preserved.

- ☐ a. multialphabetic
- ☒ b. transposition-based
- ☐ c. polyalphabetic
- ☐ d. monoalphabetic

**QUESTION 16**

4 points

Save Answer

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**QUESTION 17**

4 points

Save Answer

\_\_\_\_\_ software is designed to detect and remove viruses that have infected your memory, disks, or operating system.

- ☐ a. Uninstall
- ☐ b. Remote access
- ☒ c. Antivirus
- ☐ d. Backup

**QUESTION 18**

4 points

Save Answer

The first security protocol for wireless LANs was \_\_\_\_\_.

- ☐ a. Wi-Fi Protected Access (WPA)
- ☒ b. Wired Equivalency Protocol (WEP)
- ☐ c. IEEE 802.11i
- ☐ d. IPsec

**QUESTION 19**

4 points

Save Answer

Typically, a switched network reaches saturation when its network utilization is at \_\_\_\_\_ percent.

- ☐ a. 60
- ☐ b. 55
- ☒ c. 100
- ☐ d. 80

**QUESTION 20**

4 points

Save Answer

A \_\_\_\_\_ is a data network connection that makes use of the public telecommunications infrastructure but maintains privacy through the use of a tunneling protocol and security procedures.

- ☒ a. virtual private network (VPN)
- ☐ b. TCP network
- ☐ c. DHCP
- ☐ d. NAT network

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**QUESTION 22**

4 points

Save Answer

NDS is based on a well-known standard for directory services called \_\_\_\_.

- ☐ a. X.700
- ☐ b. X.300
- ☐ c. X.600
- ☒ d. X.500

**QUESTION 23**

4 points

Save Answer

\_\_\_\_ is a terminal emulation program for TCP/IP networks, such as the Internet, that allows users to log in to a remote computer.

- ☒ a. Remote login
- ☐ b. DNS
- ☐ c. ARP
- ☐ d. FTP

**QUESTION 24**

4 points

Save Answer

\_\_\_\_ usually involves having a software program that monitors every transaction within a system.

- ☐ a. Routing
- ☒ b. Computer auditing
- ☐ c. Firewalling
- ☐ d. Access rights

**QUESTION 25**

4 points

Save Answer

Active Directory is built around the \_\_\_\_.

- ☐ a. X.500 standard
- ☒ b. Lightweight Directory Access Protocol (LDAP)
- ☐ c. 802.11 protocol
- ☐ d. Ethernet standard

**QUESTION 26**

4 points

Save Answer

Click Save and Submit to save and submit. Click Save All Answers to save all answers.

**QUESTION 27**

4 points

[Save Answer](#)

SSL's successor is \_\_\_\_, which is based upon SSL version 3 and contains a few technical improvements over SSL.

- ☐ a. Advanced Encryption Standard (AES)
- ☐ b. IPsec
- ☒ c. Transport Layer Security (TLS)
- ☐ d. Date Encryption Standard (DES)

**QUESTION 28**

4 points

[Save Answer](#)

\_\_\_\_ is a set of protocols developed by the Internet Engineering Task Force to support the secure exchange of data packets at the IP layer.

- ☐ a. PPP
- ☐ b. SLIP
- ☒ c. IPsec
- ☐ d. PPTP

**QUESTION 29**

4 points

[Save Answer](#)

A \_\_\_\_ is a legally binding, written document, that can include service parameters offered in the service, various types of service/support options, incentives if the service levels are exceeded, and penalties if service levels are not met.

- ☐ a. connection admission control
- ☐ b. service level agreement
- ☒ c. software license agreement
- ☐ d. congestion control

**QUESTION 30**

4 points

[Save Answer](#)

\_\_\_\_ and virtual circuit networks require path setup time and cannot dynamically reroute packets should a network problem occur.

- ☐ a. Wireless
- ☐ b. Datagram
- ☐ c. Broadcast
- ☒ d. Circuit-switched

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**QUESTION 31****4 points****Save Answer**

\_\_\_\_\_ technique is also known as disk mirroring.

- ☐ a. RAID-0
- ☐ b. RAID-3
- ☒ c. RAID-1
- ☐ d. RAID-5

**QUESTION 32****4 points****Save Answer**

\_\_\_\_\_ lets a router represent an entire local area network to the Internet as a single IP address.

- ☒ a. NAT
- ☐ b. ARP
- ☐ c. ICMP
- ☐ d. UDP

**QUESTION 33****4 points****Save Answer**

If you are given the IPv4 address 1000 0001 1000 1101 0000 1100 1100 1111, what is that address in dotted decimal notation?

- ☒ a. 129.141.12.207
- ☐ b. 65.77.8.110
- ☐ c. 2.4.2.6
- ☐ d. 65.77.12.111

**QUESTION 34****4 points****Save Answer**

\_\_\_\_\_ is a packet-switched network that was designed for transmitting data over fixed lines.

- ☐ a. IntraLATA
- ☐ b. T-1
- ☒ c. Frame relay
- ☐ d. InterLATA

**QUESTION 35****4 points****Save Answer**

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**QUESTION 36**

4 points

Save Answer

IEEE \_\_\_\_ addresses both weaknesses of WEP by allowing the keys, encryption algorithms, and negotiation to be dynamically assigned, and by adopting the AES encryption based on the Rijndael algorithm with 128-, 192-, or 256-bit keys.

- ☐ a. 802.11g
- ☐ b. 802.11a
- ☒ c. 802.11i
- ☐ d. 802.11b

**QUESTION 37**

4 points

Save Answer

In the older classful addressing scheme of IP addresses, how many class A addresses existed?

- ☐ a. 1
- ☐ b. 2 million
- ☐ c. 10
- ☒ d. 128

**QUESTION 38**

4 points

Save Answer

\_\_\_\_ is a common application layer protocols that servers and the Internet use to deliver streaming audio and video data to a user's browser.

- ☒ a. Real-Time Protocol (RTP)
- ☐ b. Secure Shell (SSH)
- ☐ c. Transport Control Protocol (TCP)
- ☐ d. Voice over IP (VoIP)

**QUESTION 39**

4 points

Save Answer

All wide area networks are collections of at least two basic types of equipment: a station and a \_\_\_\_.

- ☐ a. link
- ☐ b. workstation
- ☒ c. none
- ☐ d. server

Click Save and Submit to save and submit. Click Save All Answers to s

4 points

Save Answer

\_\_\_\_\_ is a set of protocols created to support the secure transfer of data at the IP layer.

- ☐ a. Advanced Encryption Standard (AES)
- ☐ b. Transport Layer Security (TLS)
- ☒ c. IPsec (IP security)
- ☐ d. Date Encryption Standard (DES)

**QUESTION 41****4 points****Save Answer**

The primary goal of \_\_\_\_\_ software is to perform crash stalling, or to try to keep the operating system running long enough to perform a graceful exit.

- ☐ a. network monitoring
- ☒ b. crash protection
- ☐ c. sniffer
- ☐ d. antivirus

**QUESTION 42****4 points****Save Answer**

One of the biggest changes to affect the Internet will be the continuing adoption of a new version of the Internet Protocol, version \_\_\_\_\_.

- ☐ a. IPv3
- ☐ b. IPv4
- ☐ c. IPv5
- ☒ d. IPv6

**QUESTION 43****4 points****Save Answer**

MPLS and VPNs continue to replace which long-distance data services?

- ☐ a. Telnet and FTP
- ☐ b. Google and Yahoo
- ☐ c. frame relay and FTP
- ☒ d. frame relay and ATM

**QUESTION 44****4 points****Save Answer**

A \_\_\_\_\_ license allows a software package to be installed anywhere within a

*Click Save and Submit to save and submit. Click Save All Answers to s*

\_\_\_\_\_ is high-quality encryption software that has become quite popular for creating secure e-mail messages and encrypting other types of data files for average users.

- ☐ a. 3DES
- ☐ b. AES
- ☒ c. PGP
- ☐ d. DES

**QUESTION 46**

4 points

Save Answer

As long as a telephone call remains within a LATA (a(n) \_\_\_\_\_ call), the telephone call is local and is handled by a local telephone company.

- ☐ a. extraLATA
- ☒ b. intraLATA
- ☐ c. outerLATA
- ☐ d. outLATA

**QUESTION 47**

4 points

Save Answer

After the 1984's Modified Final Judgment, the long-distance telephone companies became known as \_\_\_\_\_.

- ☐ a. central office exchange service
- ☐ b. local exchange carriers (LECs)
- ☒ c. interexchange carriers (IECs or IXC's)
- ☐ d. private branch exchange (PBX's)

**QUESTION 48**

4 points

Save Answer

The intent of SDLC is for \_\_\_\_\_ not to be disjointed steps in a big plan, but overlapping layers of activity.

- ☐ a. cycles
- ☐ b. levels
- ☐ c. rounds

Click Save and Submit to save and submit. Click Save All Answers to s

4 points

Save Answer

The Telecommunications Act of 1996 mandated that the existing local telephone companies, now called \_\_\_\_, must give CLECs access to their telephone lines.

- ☒ a. incumbent local exchange carriers (ILECs)
- ☐ b. interexchange carriers (IECs)
- ☐ c. Centrex (central office exchange service)
- ☐ d. private Branch Exchange (PBX)

**QUESTION 50****4 points****Save Answer**

During the late 1960s, a branch of the U.S. government titled the \_\_\_\_ created one of the country's first wide area packet-switched networks.

- ☒ a. Advanced Research Projects Agency (ARPA)
- ☐ b. Department of Defense
- ☐ c. IEEE
- ☐ d. IETF

*Click Save and Submit to save and submit. Click Save All Answers to s*