

**CENTRE FOR DEVELOPMENT OF ADVANCED COMPUTING**  
(Dept. of IT, Ministry of Communications & Information Technology, Govt. of India)  
B-30, Sector-62, NOIDA – 201301

**QUESTION PAPER- TERM –II MODULE Test**  
**PGDISAD-VI**

*Date: 19/07//2012*

*Maximum Marks: 100*

*Maximum Time: 2 HRS*

**SECTION I-SECURITY**

Q1. DES has an initial and final permutation block and \_\_\_\_\_ rounds.

- a. 14
- b. 15
- c. 16
- d. None of the above.

Q2. ECB and CBC are \_\_\_\_\_ ciphers.

- a. Block
- b. Stream
- c. Field
- d. None of the above

Q3. The \_\_\_\_\_ method provides a one-time session key for two parties.

- a. RSA
- b. Diffie-Hellman
- c. DES
- d. AES

Q4. The \_\_\_\_\_ attack can endanger the security of the Diffie-Hellman method if two parties are not authenticated to each other.

- a. Man-in-middle
- b. Ciphertext
- c. Plaintext
- d. None of the above

Q5. Which software use to encrypt mail by the use of public and private key

- a. Gpg4win
- b. Mail Encryption
- c. MS Office
- d. Encryption

Q6. If  $p=11$  and  $q=17$ , the public and private keys for encrypting through RSA algorithm are

- a. (7,187) and (23,87)
- b. (3,187) and (107,187)
- c. (5,187) and (23, 187)
- d. Both a and b

Q7. If a computer system is not accessible, then it's a violation of

- a. availability attribute
- b. confidentiality attribute
- c. authentication
- d. access control

Q8. \_\_\_\_\_ is a message digest algorithm.

- a. DES
- b. IDEA
- c. MD5
- d. RSA

Q9. Hackers often gain entry to a network by pretending to be at a legitimate computer.

- a. spoofing
- b. forging
- c. IP spoofing
- d. ID theft

Q10. Bell la-padula model is a

- a. discretionary access control model
- b. mandatory access control model
- c. role based access control model
- d. task based access control model

Q11. A hacker that changes or forges information in an electronic resource, is engaging in

\_\_\_\_\_.

- a. denial of service
- b. sniffing
- c. terrorism
- d. data diddling

Q12. Defense in depth implies

- a. single layer of security
- b. multiple layers of security
- c. security architecture

Q13. The credit card fraud is an example of

- a. identity theft
- b. sniffing
- c. keystroke capture
- d. password attack

Q14. PGP uses which type of encryption {PGP : Pretty Good Privacy}

- a. Asymmetric
- b. Symmetric
- c. Hybrid

Q15. Modification issue is related to-

- a. Confidentiality
- b. Integrity
- c. Availability
- d. Access Control

Q16. A \_\_\_\_\_ is a small program embedded inside of a GIF image.

- a. web bug
- b. cookie
- c. spyware application
- d. spam

Q17. The geographic region and email sender is identified by

- a. NeSA
- b. Wireshark
- c. Email-Tracer
- d. Cybercheck

Q18. Which cyber forensics tool is used for forensic analysis

- a. Cyberinvestigator
- b. Cybercheck
- c. NeSa
- d. Wireshark

Q19. Packet capturing in a network can be done by

- a. NetSA
- b. Wireshark
- c. Both a and b
- d. None of the above

Q20. Which data for cyber forensics is/are volatile(choose all that apply)

- a. Memory
- b. Registry information
- c. File System information
- d. Internet history

Q21. Tool for password recovery of ms word document is

- a. Apdfr
- b. Aopr
- c. Password pro
- d. Cmos

Q22. Tool used for seizure and acquisition is or are

- a. Trueback
- b. Hasher
- c. Cofee
- d. AOPR

Q23. . Static Analysis is also known as

- a. Live Forensics
- b. Traditional Forensics
- c. Computer Forensics
- d. Disk Forensics

Q24. Cyber Forensics Steps include

- a. Seizure
- b. Acquisition
- c. Both a and b
- d. None of the above

Q25. What frequency band does 802.11g operate in?

- a. 900Mhz
- b. 2.4 Ghz
- c. 5 Ghz
- d. Both a and b

Q26. Security layer in WAP is similar to which layer in OSI model

- a. Application Layer
- b. Network Layer
- c. Physical Layer
- d. Presentation Layer

Q27. Bluetooth works on

- a. 2.4 Ghz ISM band
- b. 5.4 Ghz ISM band
- c. 5.4 Mhz ISM band
- d. 40 Mhz ISM band

Q28. An arbitrary collections of Bluetooth enabled devices physically close to each other

- a. Scatternet
- b. Piconet
- c. Both of above
- d. None of above

Q29. WAP application are(choose two)

- a. Checking Train table.
- b. Looking up stock value
- c. Online Banking
- d. Online Shopping

Q30. The mode attribute is related with-

- a. I element
- b. p element
- c. a element
- d. none of the above

Q31. Metadata is placed between the element

- a. <p>
- b. <a>
- c. <head>
- d. < anchor>

Q32. Preformatted Text is specified by tag

- a. <go>
- b. <do>
- c. <pre>
- d. <head>

Q33. We don't want our packets to get lost in transit. Which OSI layer is responsible for ordered delivery of packets?

- a. Network
- b. **Link**
- c. Transport
- d. Physical

Q34. What is the difference between a switch and a hub?

- a. Switches operate at physical layer while hubs operate at data link layer
- b. Switches operate at data link layer while hubs operate at transport layer
- c. **Switches operate at data link layer while hubs operate at physical layer**
- d. Switches operate at transport layer while hubs operate at physical layer

Q35. The Internet is an example of a:

- a. circuit switched network.
- b. cell switched network.
- c. **packet switched network.**
- d. None of these

Q36. Which of the following are true about firewalls? (Select all that apply.)

- a. **Filters network traffic**
- b. Can be either a hardware or software device
- c. Follows a set of rules
- d. Can be configured to drop packets

Q37. Firewalls are designed to perform all the following except:

- a. Limiting security exposures
- b. Logging Internet activity
- c. **Enforcing the organization's security policy**
- d. Protecting against viruses

Q38. You want to have a private communication between two sites that also allows for encryption and authorization. Which of the following is the best choice in this instance?

- a. Modem
- b. Firewall
- c. **VPN**
- d. Bastion Host

Q39. Which of the following firewall types will allow for port security?

- a. Stateful Inspection
- b. Packet filtering
- c. Application filtering
- d. None of the above

Q40. Which of the following characteristics of an intranet are true? (Select all that apply.)

- a. An intranet can be a part of a Local Area Network (LAN)
- b. An intranet is designed to be publicly available
- c. An intranet can work with Wide Area Networks (WAN)
- d. An intranet may be restricted to a community of users

## SECTION II-Linux

Q41. What is the command that can run a service permanently

- a. Checkconfig --level levelno service on
- b. Checkconfig --list levelno service on
- c. Service servicename start
- d. None of the above

Q42. You are the Linux Administrator for your company. Your company is running with a generic Linux solution. You are configuring mount points. Which of the following directories hold the mount points (Choose all that apply)?

- a. /mt
- b. /mntpt
- c. /mount
- d. None of the choices

Q43. Which of the following characters at the beginning of a filename will cause it to be hidden?

- a. !
- b. #
- c. .
- d. %
- e. ~

Q44. You are the Linux Administrator for your company. Your company is running with a generic Linux solution. You need to change the permission on an existing file. You plan to use the chmod command. With this command, what value can be accepted ?

- a. Expressions
- b. Numeric
- c. Boolean
- d. Symbolic

Q45. ----- is a pseudo filesystem that is used to read kernel datastructures.

- a. /dev
- b. /dev/kmem
- c. /proc
- d. /dev/proc

Q46. Which process has a PID of 1?

- a. the kernel
- b. lilo
- c. init
- d. bash

Q47. You are the Linux Administrator for your company. Your company is running with a generic Linux solution. You are managing the files on your system. You need to create links. Which of the following correctly describe a hard link?

- a. It is an alias to your file
- b. All of the aliases will share the common inode
- c. It is an alias to the directory
- d. Each alias will use its own inode

Q48. You have to allocate the addresses 192.168.0.1 to 192.168.0.123 to eth1. You have to edit:

- a. /etc/sysconfig/network-scripts/eth{1,1:0,1:2 .. 1:123}
- b. /etc/sysconfig/network-scripts/ifcfg-eth0
- c. /etc/sysconfig/network-scripts/ifcfg-eth1-range0
- d. /etc/sysconfig/network

Q49. The default umask for a non-privileged user on a Red Hat system is:

- a. 777
- b. 222
- c. 002
- d. 755



Q50. You are the Linux Administrator for your company. Your company is running with a generic Linux solution. You need to install Linux on a Pentium III with 64MB of RAM and 10GB of hard drive space. Which of the following would be an appropriate partition configuration?

- a. **A.6GB primary partition 128MB swap**
- b. 3GB primary partition 64MB swap
- c. 8GB primary partition 1GB swap
- d. None

Q51. Dual boot system means that:

- a. **one can work on any OS of his choice**
- b. It help in load sharing
- c. login is controlled by one OS and rest process by another
- d. None of the above

Q52. You have installed GRUB boot loader. Where will you find files relating to that?

- a. **/boot**
- b. /var/fsck/orphan-files
- c. tmp of the filesystem
- d. lost+found of the filesystem

Q53. What is the command to quit and discard any changes in the vi text editor?

- a. :wq!
- b. :w!
- c. :q!
- d. **:q**

Q54. Which command shows user and group information of a user?

- a. **Id**
- b. Whoami
- c. Who
- d. Whodo

Q55. Which statement is true about the file /etc/hosts? (Choose two)

- a. **It gives the hosts name and their IP address.**
- b. Any user can modify it.
- c. It reside in /etc/default.
- d. It is created automatically after the install of linux os.
- e. It contains hostnames, IP addresses and usernames.

Q56 You are the Linux Administrator for your company. Your company is running with a generic Linux solution. You are using tar. Which tar options can show the file list while compressing?

- a. tar -x backup.tar /backup
- b. tar -ctf backup.tar /backup
- c. tar -xf backup.tar /backup
- d. tar -df backup.tar /backup

Q57. You are the Linux Administrator for your company. Your company is running with a generic Linux solution. You are managing the files on your system. You need to create links. Which of the following correctly describe a hard link?

- a. It is an alias to your file
- b. All of the aliases will share the common inode
- c. It is an alias to the directory
- d. Each alias will use its own inode

Q58. What does the -a option do in the ls command.

- a. list files in long format
- b. list hidden files
- c. This is not a valid option for the ls command

Q59. What is an inode?

- a. The internal representation of a file
- b. The internal representation of a disk.
- c. The internal representation of the superblock.
- d. None of the above

Q60. What type of packet does an IP ping use (provide acronym)?

- a. ICMP
- b. HTTP
- c. IMAP
- d. SNMP

Q61. What file is used for associating port numbers to port names.

- a. /etc/services
- b. /etc/hosts
- c. /etc/securetty
- d. /etc/ports

Q62. Which command can be executed by a user who is already logged into the system, in order to change to the root user? (type the command without any parameters)

- a. **su**
- b. sudo
- c. switch
- d. login

Q63. Type the full command you could use to decompress the file "foo.gz" (chose three Ans)

- a. gzip -d foo.gz
- b. **gunzip -d foo.gz**
- c. **gunzip foo.gz**
- d. **unzip foo.gz**

Q64. You need to find out which package owns a file called /etc/paper.config. Which command will answer this question?

- a. rpm -qf /etc/paper.config
- b. **rpm -qa|grep /etc/paper.config**
- c. rpm -Fq /etc/paper.config
- d. rpm -q /etc/paper.config

Q65. What is the filesystem id of a Linux swap partition?

- a. /dev/hda1
- b. /swap
- c. **82**
- d. 83

Q66. By default, the home directory of every user falls under -----.

- a. /usr
- b. **/home**
- c. /users
- d. /local

Q67. The name of a reverse lookup zone file has to end in a:

- a. **in-addr.arpa**
- b. com
- c. net
- d. None of these

Q68. The user may add his own specific aliases and functions in:

- a. /etc/bashrc
- b. /etc/profile
- c. **~/.bashrc**
- d. ~/.bash\_profile

Q69. To enable a service immediately from the command line, you have to use \_\_\_\_\_.

- a. **chkconfig**
- b. ntsysv
- c. **service**
- d. setup
- e. None of the choices

Q70. The maximum number of partitions on a SCSI hard disk is

- a. 4
- b. **15**
- c. 63
- d. 64

### **SECTION III(ASP.NET)**

Q71. Which methods provided by the dataset object to generate XML in ADO.Net?

- a. ReadXML
- b. GetXML
- c. Writexml
- d. **All of Above**

Q72. Which one is the method of Connection object in ADO.Net?

- a. **open()**
- b. new()
- c. ConnectionOpen()
- d. None of these

Q73.The DataSet object is a \_\_\_\_\_ storage.

- a. connected
- b. disconnected
- c. polling
- d. None

Q74.\_\_\_\_\_ is a bridge between a DataSet and data source for retrieving and saving data.

- a. DataControler
- b. DataCommand
- c. DataAdapter
- d. None

Q75 How instantiate the DataReader ?

- a. by calling a Command object's ExecuteReader.
- b. by calling a Query object's ExecuteQuery.
- c. by calling a new().
- d. None

.Q76 .Which method is used to perform the magic of locating and loading the XML file?

- a. ReadXml()
- b. WriteXml()
- c. Both 1 & 2
- d. None

Q77.Which control registered the client script for the Microsoft Ajax library with the page.

- a. UpdatePanel control
- b. ScriptManager control
- c. Update Progress Control
- d. Both 2 & 3

Q78.What are the child tags of Update Panel.

- a. Content Template
- b. Triggers Tags
- c. Both 1 & 2
- d. None of the above

Q79. Which of the following are correct controls in ASP.NET Source View?()

- a. <asp:textbox runat="server" id="Msg" text="Hello, R4R" />
- b. <asp:button runat="server" id="Send" text="Send" onclick="Send\_Click" />

c. None

d. Both

Q80. Which is used for code-in-line model?

- a. `< script runat="server">`
- b. `< script javascript="server">`
- c. Both
- d. None

Q81. Which is code allows the modification of the head tag at runtime?

- a. `< head runat="server">`
- b. `< script javascript="server">`
- c. Both
- d. None

Q82. ASP.NET Supports “Nested Master Page”

- a. Yes
- b. No

Q83. Which is true ?

- a. Page Class is a derivative of the Control class.
- b. Page Class inherits all properties, methods, and events exposed by the Control class.
- c. Both
- d. None

Q84. Correct syntax of ASP.NET directive:

- a. `<%@ directive [attribute=value] %>.`
- b. `<% directive [attribute=value] %>.`
- c. `<@ directive [attribute=value] %>.`
- d. `<@ directive [attribute=value] >.`

Q85. The namespaces that are automatically imported into all ASP.NET pages

- 1.System, System.Collections, System.IO
- 2.System.Web, System.Web.UI
- 3.System.Web.UI.HtmlControls, System.Web.UI.WebControls

- a. 1
- b. 1,2,3
- c. 2,3
- d. None

Q86.The ASP.NET pages directives are

1. @ Page, @ Control, @ Import, @ Register
2. @ Assembly, @ OutputCache
3. System.Web.UI.HtmlControls, System.Web.UI.WebControls

- a. 1,2
- b. 1,2,3
- c. C, 2,3
- d. None

Q87. Syntax for Assembly directive specifies

- a. < Assembly runat="server" [language="language"]>

//code.....  
</ Assembly >

- b. <%@ Assembly Name="r4r" %>

- c. 1 and 2
- d. None

Q88.Syntax for Register directive specifies

- a. < Register runat="server" [language="language"]>

//code.....  
</ Register >

- b. `<%@ Register Tagprefix="r4r" TagName="CustomControl  
Src="CustomControl.ascx" %>`
- c. 1 and 2
- d. None

Q89. Syntax for Custom-Control to insert a custom control into a page

- a. `<tagprefix:tagname id="controlID" runat="server"  
eventname="eventHandler" />`
- b. `<%@ Import Namespace="System.Data" %>`
- c. 1 and 2
- d. None

Q90. Syntax for Import directive specifies

- a. `<%@ Import Namespace="System.Data.OleDb" %>`
- b. `<%@ Import Namespace="System.Data" %>`
- c. a and b
- d. None

Q91. Which is true to bind a method by setting the Master attribute in the <pages>?

- a. `< configuration>  
< system.web>  
< pages masterpagefile="r4r.co.in.MasterPage" />  
</system.web>  
</configuration>`
- b. `< pages>  
< system.web>  
< pages masterpagefile="r4r.co.in.MasterPage" />  
</system.web>`



- </ pages>
- c. Both
- d. None

Q92. @Page directive

<%@ MasterType VirtualPath="~/MasterPage.master" %>

The above syntax is used to make the Master property typed to the class that is stored in the referenced master on ASP page.

- a. Yes
- b. No

Q93. XML stands for?

- a. eXtra Markup Language
- b. eXplore Markup Language
- c. eXpensive Markup Language
- d. eXtensible Markup Language

Q94. Which one method is used for comment in XML?

- a. //
- b. !
- c. <!--
- d. All

Q95. What is the stand form of the DTD?

- a. Document Type Definition
- b. Document Transfer Definition
- c. Document Text Definition
- d. None

Q96. What is the stand form of the XSLT?

- a. Extensible Stylesheet Language Transformations
- b. Extensible Style Language Transform
- c. Extensible Style Language Transform
- d. None

Q97. Using which tag we insert an JavaScript in HTML page?

- a. <JavaScript type="text/javascript"></JavaScript>
- b. <script type="text/javascript"></script>
- c. <JScript type="text/javascript"></JScript>

d. <HTMLScript type="text/javascript"></HTMLScript>

Q98. What is MSIL?

- a. Multi Socket Interface Library
- b. **Microsoft Intermediate Language**
- c. Microsoft Interface Language
- d. Microsoft Integer Long

Q99. Which is true for C#?

- a. C# supports interfaces.
- b. C# also provides support for structs.
- c. C# provides component-oriented features
- d. **All**
- e. None

.Q100. Does C# support multiple-inheritance?

- a. **No**
- b. Yes

