

HSST COMPUTER SCIENCE (SR FOR SC/ST)(ONLINE EXAM)

EXAM DATE:29-12-2016

**1.The buffer overflow attack is caused by**

- A.Vulnerability in the design of a networking protocol
- B.Vulnerability in the implementation of a networking protocol
- C.Vulnerability in human behavior
- D.Vulnerability in software\*

Ans:D

**2.Which of the following is not valid IPv4 addresses?**

- A.192.10.14.3
- B.201.172.275.33\*
- C.65.90.11.00
- D.193.20.250.10

Ans:B

**3.Address resource records are associated with**

- A.Routing tables in Internet routers
- B.ARP aches in LAN workstations
- C.DNS servers\*
- D.None of the above

Ans:C

**4.Which of the following protocols is used in accessing web**

**mail?**

A.HTTP\*

B.SMTP

C.POP3

D.IMAP

Ans:A

**5.If  $\gcd(a,b)=x$  and  $\gcd(b,c)=y$ ,then  $\gcd(a,c)$ is**

A.xy

B. $\gcd(x,y)$

C. $xy/\gcd(x,y)$

D.None of these\*

Ans:D

**6.Assuming the same key is used,two occurrences of the same plaintext characters are encrypted as identical output symbols in which of the following**

A.Caesar cipher\*

B.Vigenere cipher

C.Hill cipher

D.One time pad

Ans:A

**7.A product cipher is constructed using a combination of**

- A.Symmetric and asymmetric ciphers
- B.Substitution and transposition ciphers\*
- C.Monoalphabetic and polyalphabetic ciphers
- D.Stream and block ciphers

Ans:B

**8.Which of the following characteristics is most widely used in fingerprint recognition?**

- A.Number and coordinates of arch patterns
- B.Number and coordinates of loop patterns
- C.Coordinates and orientations of fingerprint minutiae\*
- D.Number and coordinates of whorl patterns

Ans:C

**9.During the initial stages of an attack by a new internet scanning worm,the number of infected machines increases**

- A.Exponentially with time\*
- B.Logarithmically with time
- C.Polynomially with time
- D.At a constant rate

Ans:A

**10.Use privileges in windows are stored in**

- A.DACL

B.ACE

C.Access token\*

D.SID

Ans:C

**11.Probabilistic packet marking is technique used in support of**

A.DDOS prevention

B.IP traceback\*

C.DDoS detection

D.Worm detection

Ans:B

**12.The role of the payment gateway is**

A.A proxy to the merchant

B.A financial service provider

C.A government regulator

D.A proxy to the bankcard network\*

Ans:D

**13.What type of parameters are used in transcendental functions in Java?**

A.Double\*

B.Long

C.Byte

D.Int

Ans:A

**14.In what format is Java's character set represented?**

A.16 bits ASCII

B.16 bits Unicode\*

C.16 bits EBC

D.None of the above

Ans:B

**15.Basic futures of structured programming**

A.Sequence

B.Looping

C.Branching

D.All of the above\*

Ans:D

**16.In which year Java was developed?**

A.1989

B.1990

C.1991\*

D.1992

Ans:C

### **17.What feature of C++ was dropped in Java?**

- A.Virtual function
- B.Abstract class
- C.Inheritance
- D.Pointers\*

Ans:D

### **18.What type of storage class is involved when we pass by value in function?**

- A.External
- BAutomatic\*
- C.Static
- D.Register

Ans:B

### **19.What is Java equivalent of const in C++?**

- A.Const
- B.Define
- C.Final\*
- D.All of the above

Ans:C

### **20.What is another name for semantic errors?**

- A.Runtime errors\*

B.Compile time errors

C.Syntax errors

D.None of the above

Ans:A

**21.What are units of width and height specified in HTML tag?**

A.Pixels\*

B.Bytes

C.Bits

D.All of the above

Ans:A

**22.What will be the values of x,m and n after execution of the following statements?**

**Int x,m,n;**

**m=10;**

**n=15;**

**x=++m+n++;**

A.x=25,m=10,n=15

B.x=27,m=10,n=15

C.x=26,m=11,n=16\*

D.x=27,m=11,n=16

Ans:C

**23.What will be the result of the expression 13 and 25?**

A.38

B.9\*

C.25

D.12

Ans:B

**24.Which of the following will produce a value of 22 if x=22.9?**

A.ceil(x)

B.log(x)

C.abs(x)

D.floor(x)\*

Ans:D

**25.Which is the legal ways to access a class data member using the pointer?**

A.this.x

B.\*this.x

C.\*(this.x)

D.(\*this).x\*

Ans:D

**26.Which is the legal ways to access a class data member using this pointer?**



- A.list
- B.queue
- C.map\*
- D.string

Ans:C

**27.Which one of the following is a sequence container?**

- A.stack
- B.deque\*
- C.queue
- D.set

Ans:B

**28.What does the acronym BCPL stands for?**

- A.Basic Combined Programming Language\*
- B.Basic Compiler Programming Language
- C.Beginners Combined Programming Language
- D.None of the above

Ans:A

**29.What was Ken Thompson's version of C called?**

- A.C++
- B.B\*
- C.P

D.None of the above

Ans:B

**30.What does the fopen()function return?**

A.Address

B.Pointer

C.File pointer\*

D.All of the above

Ans:C

**31.Recursive algorithms are based on**

A.Divide and conquer approach

B.Top-down approach

C.Bottom-up approach\*

D.Hierarchial approach

Ans:C

**32.The Sorting method which is used for external sort is**

A.Bubble sort

B.Quick sort

C.Merge sort

D.Radix sort\*

Ans:D

**33.Worst case efficiency of binary search is**

A.  $\log_2 n + r^*$

B.  $n$

C.  $2^n$

D.  $\log n$

Ans:A

**34.What is the type of the algorithm used in solving the 8 Queens problem?**

A.Dynamic

B.Backtracking\*

C.Branch and Bound

D.None of the above

Ans:B

**35.The time taken by NP-class sorting algorithm is**

A. $O(1)$

B. $O(\log n)$

C.  $O(n^2)$

D.  $O(n)^*$

Ans:D

**36.How many nodes are there in a full state space tree with  $n=6$ ?**

A.65

B.64

C.63\*

D.32

Ans:C

**37.Prims algorithm is based on -----method**

A.Divide and conquer method

B.Greedy method\*

C.Dynamic programming

D.Branch and bound

Ans:B

**38.Graph Colouring is which type of algorithm design strategy**

A.Backtracking\*

B.Greedy

C.Branch and Bound

D.Dynamic programming

Ans:A

**39.The asymptotic notation for defining the average time complexity is**

A.Equivalence\*

B.Symmetric

C.Reflexive

D.All of the above

Ans:A

**40.The complexity of merge sort algorithm is**

A. $O(n)$

B.' $O(n^2)$ '

C. $O(\log n)$

D. $O(n \log n)^*$

Ans:D

**41.Dijkstra's banking algorithm in an operating system,solves the problem of**

A.Deadlock recovery

B.Mutual exclusion

C.Deadlock avoidance\*

D.None of these

Ans:C

**42.Interval between the time of submission and completion of the job is called**

A.Waiting time

B.Response time

C.Throughput

D.Turnaround time\*

Ans:D

**43.The example of non-pre emptive scheduling is**

A.First-Come-First-Served\*

B.Round Robin

C.Last-in-First-Out

D.Shortest-Job-First

Ans:A

**44.-----is a process-to-process protocol that adds only port addresses,checksum,error control and length information to the data from the upper layer:**

A.TCP

B.UDP\*

C.IP

D.None of the above

Ans:B

**45.The RSA algorithm uses a -----cryptography method**

A.Public Key\*

B.Private Key

C.Symmetric Key

D.All the above

Ans:A

**46.The -----attack is related to confidentiality**

- A.Fabrication
- B.Interception\*
- C.Modification
- D.Interruption

Ans:B

**47.The cryptography method in which the plaintext BBBB become the ciphertext BCDE.This is probably**

- A.Transposition cipher
- B.Monoalphabetic substitution cipher
- C.Polyalphabetic substitution cipher\*
- D.None of the above

Ans:C

**48.The following service is not provided by digital signature**

- A.Integrity
- B.Authentication
- C.Non reputation
- D.Confidentially\*

Ans:D

**49.-----is a technique of temporarily removing inactive programs from the memory of computer system**

- A.Swapping\*
- B.Spooling
- C.Semaphore
- D.Scheduling

Ans:A

**50.Fence register is used for**

- A.CPU protection
- B.Memory protection\*
- C.File protection
- D.Processor protection

Ans:B

**51.The -----clause is used to list the attributes desired in the result of a query**

- A.Where
- B.From
- C.Select\*
- D.Having

Ans:C

**52.We express queries in QBE by**

- A.Datalog
- B.Skeleton tables\*



C.Entitysets

D.SQL

Ans:B

**53.-----is a set of permitted values for each attribute**

A.Domain\*

B.Entity

C.Constraints

D.Relationship

Ans:A

**54.Minimal super keys are called**

A.Primary key

B.Foreign key

C.Candidate key\*

D.Unique

Ans:C

**55.A relation is in-----every non-key attribute is irreducibly dependent on the primary key**

A.1NF

B.2NF\*

C.3NF

D.4NF

Ans:B

**56.A statement that the system executes automatically when a database related event occurs**

A.View

B.Alter

C.Assertion

D.Trigger\*

Ans:D

**57.An index record appears for every search key value in the file**

A.Dense Index\*

B.Sparse index

C.Hash index

D.Single-key index

Ans:A

**58.In hashing,we use the term to denote a unit of storage that can store one or more records.**

A.Field

B.Hash function

C.Index

D.Bucket\*

Ans:D

**59.The number of transactions executed in a given amount of time is called**

- A.Response time
- B.Waiting time
- C.Throughput\*
- D.Performance

Ans:C

**60.-----is a predicate expressing a condition that we wish the database always to satisfy**

- A.Autherization
- B.Deadlock
- C.QBE
- D.Assertion\*

Ans:D

**61.A variation in the representation of the waterfall model is called**

- A.Classic life cycle
- B.V-Model\*
- C.Incremental process model
- D.Spiral model

Ans:B

**62.The most common manifestation of separation of software**

**into separately named and addressable components is called**

- A.Concern
- B.Pattern
- C.Modularity\*
- D.Independence

Ans:C

**63.-----is an indication of the relative interdependence among modules**

- A.Coupling\*
- B.Cohesion
- C.Hiding
- D.Refactoring

Ans:A

**64.The diagram which help you to determine the functionality and features of the software from the user's perspective**

- A.Class diagram
- B.Deployment diagram
- C.Sequence diagram
- D.Use-case diagram\*

Ans:D

**65.-----testing is focuses on the functional requirements of**

**the software.**

- A.White-box testing
- B.Black-box testing\*
- C.Condition testing
- D.Unit testing

Ans:B

**66.The software metric that provides a quantitative measure of the logical complexity of a program**

- A.Cylcomatic complexity\*
- B.Defect removal efficiency
- C.Object-oriented metrics
- D.LOC

Ans:A

**67.----is the most widely used strategy for statistical quality assurance in industry**

- A.Pareto principle
- B.CMM
- C.Six Sigma\*
- D.IEEE

Ans:C

**68.-----is an agile software development approach**

- A.Extreme programming\*
- B.Quality function deployment
- C.PSPEC
- D.Unified process

Ans:A

**69.-----provides a notation that translates actions and conditions described in a use case into a tabular form**

- A.Decision tree
- B.Pattern
- C.Linear structures
- D.Decision tables\*

Ans:D

**70.-----is a project scheduling method**

- A.PERT\*
- B.Scrum model
- C.UML
- D.RAD

Ans:A

**71.The bus carries bits between**

- A.Microprocess and Memory
- B.Microprocessor and I/Os

C.Memory and I/Os

D.Microprocessor,Memory and I/Os\*

Ans:D

**72.The Gray code for the binary number'(101110)-(2)'is**

A.111101

B.111001\*

C.111011

D.111010

Ans:B

**73.Simplify the expression  $AB+A(B+C)+B(B+C)$  using Boolean algebra techniques is**

A. $C+AC$

B. $A+AC$

C. $B+AC^*$

D. $B+AB$

Ans:C

**74.How many 74154 4-line-to-16-line decoders are necessary to decode a six-bit binary number?**

A.One

B.Two\*

C.Three

D.Four

Ans:B

**75.The binary equivalent for the BCD number 1000101 is**

A.' $(1010100)_{-2}$ '

B.' $(1000100)_{-2}$ '

C.' $(1110100)_{-2}$ '

D.' $(1010101)_{-2}$ '\*

Ans:D

**76.How many states are there in an eight-bit Johnson counter sequence?**

A.4

B.8

C.16\*

D.32

Ans:C

**77.How many clock pulses are required to serially enter a byte of data into an eight-bit shift register?**

A.8\*

B.16

C.32

D.64



Ans:A

**78.How many address bits are required for a 2048-bit memory?**

A.10 bits

B.11 bits\*

C.12 bits

D.13 bits

Ans:B

**79.How many tracks are there on a typical 5Square root of 2'inch floppy disk?**

A.64

B.67

C.77\*

D.87

Ans:C

**80.Visual cryptography is mainly used for**

A.Text encryption

B.Video encryption

C.Audio encryption

D.Image encryption\*

Ans:D

**81.Whose words are these”No Caste.No Religio.No God for**

## **Human being’?**

A.Shree Narayana Guru

B.K.Ayyappan\*

C.Swami Vivekananda

D.Pandit Karuppan

Ans:B

## **82.Which Article of Constitution provide uniform civil code for the citizens?**

A.Article 47

B.Article 39

C.Article 44\*

D.Article 48

Ans:C

## **83.Which agitation in Kerala is known as the ‘Maru Marakkal Samaram’?**

A.Channar Revolt\*

B.Attingal Revolt

C.Revolt of 1857

D.Kurichiyar Revolt

Ans:A

## **84.Who is known as ‘Kalidasa of Kerala’?**

A.Kerala Varma Valiya Koil Thampuran\*

B.KUmaranasan

C.Azuthachan

D.Ulloor S Parameswaran Ayyar

Ans:A

**85.Who acted the role of Shree Narayana Guru in the film'Yugapurusham'?**

A.Mammooty

B.Thalaivasal Vijay\*

C.R.Sukumaran

D.Mohanlal

Ans:B

**86.Which among the following '8^(th)'Schedule languages of the Constitution are spoken by minority polulation?**

A.Konkani

B.Dogri

C.Sanskrit\*

D.Manipuri

Ans:C

**87.The birth place of Chattampi Swamikal**

A.Kannammoola\*

- B.Venganoor
- C.Sasthamkovil
- D.Chempazani

Ans:A

**88.How many numbers of days lasted the Vaikom Satyagraha?**

- A.603 days\*
- B.618 days
- C.630 days
- D.512 days

Ans:A

**89.Which social reformer is known as the ‘Lincoln of Kerala’?**

- A.Chattampi Swamikal
- B.Pandit Karuppan\*
- C.K.Ayyappan
- D.Shree Narayana Guru

Ans:B

**90.The Jnanapit Award recipient of 2015 Raghuveer Chaudhari is famous for his writings in----language**

- A.Bengali
- B.Kannada
- C.Hindi
- D.Gujarati\*

Ans:D

**91.In which year the European Union was awarded the Nobel Prize for peace?**

A.2014

B.2013

C.2012\*

D.2015

Ans:C

**92.Which movie won the best picture award for the 2016 Oscar?**

A.The Revenant

B.Bridge of Species\*

C.Spot Light

D.Brooklyn

Ans:B

**93.Which Iranian film maker who won the 'Palme d' or' passed away recently?**

A.Majid Majidi

B.Abbas Kiarostami\*

C.Mohsen Makhmalbaf

D.Jafar Panali

Ans:B

**94.Which country is the last member State of UNO?**

- A.Bahamas
- B.Azerbaijan
- C.South Sudan\*
- D.Zimbabwe

Ans:C

**95.Whose work is “Keralam Malayalikalude Mathrubhumi”?**

- A.George Varghese
- B.B.Rajeevan
- C.Dr.D.Babu Paul
- D.E.M.S\*

Ans:D

**96.Which literary work received the Vayalar Award of 2015?**

- A.Manushyanu Oru Aamukham\*
- B.Arachaar
- C.Shyama Madhavam
- D.Anthimahakalam

Ans:A

**97.Who is the Human Resource Development Minister of Union Cabinet?**

- A.Smriti Irani

B.Prakash Javadekar\*

C.Kabilsibel

D.M.Venkaiah Naidu

Ans:B

**98.Which Article of the Constitution was names by Dr.B.R.Ambedkar as the Jewel Part?**

A.Article 32\*

B.Article 19

C.Article 29

D.Article 31

Ans:A

**99.Who won the 2016 COPA America?**

A.Argenteena

B.USA

C.Chili\*

D.Columbia

Ans:C

**100.Full form of NSG**

A.Nuclear Suppliers Group\*

B.National Security Group

C.National Savings Group

D.Nuclear Sanctioned Group

Ans:A