CISCO PAPER ON 15th JULY, 2007 AT PUNE

HI FRIENDS, I am giving you the interview questions , what they want to know from those questions , what are idial answers I GAVE 15 COMPANIES AND CLEARED 11 APTITUDE EXAMS,4G.D.,FACING 9 TIMES INTERVIEWER.

AT LAST " CAPS GEMINI " WAS THERE FOR ME.

SIR: TELL ME SOMETHING ABOUT YOU WHICH IS NOT WRITTEN HERE IN YOUR RESUME?
ME: I WAS 1 IN DISTRICT IN SCOLARSHIP EXAM IN 7TH, 11TH IN STATE IN M.T.S.E. EXAM.

IDIAL: JUST TELL ANYTHING WHICH WILL IMPRESS THEM(MAY BE FALSE) BUT WITH CONFIDENCE .(THEY DON'T NOW . ANYTHING ABOUT YOU IN CAMPUS PLACEMENT THEY DON'T SEE YOUR FILE ALSO)AS I WAS CLASS R REPRESENTATIVE .(IF YOU WAS PART OF ANY EVENT SAY" I WAS HEAD OF THAT EVENT" BUT IF YOU R SO C CONFIDENT THEN ONLY)

THEIR AIM:--TO KNOW ABOUT ANY NEW QUALITY WHICH WILL DIFFERENCIATE FROM OTHER CANDIATE AND FOURCE THEM T TAKE YOU IN COMPANY.

SIR: WHERE WILL YOU SEE AFTER 2 YEARS ? OR WHAT ARE YOUR FUTURE PLAN?
ME: I AM GOING TO GIVE GRE.(FOR FIRST INTERVIEW)

IDIAL: I WANT TO BE PROJECT MANAGER OR TEAM LEADER.
THEIR AIM:--HOW MUCH LONG YOU WILL REMAIN IN COMPANY(THEY WILL TAKE CANDIDATE WITH LONG TIME COMPANY E EMPLOYER)(#*SO DON'T SAY GRE, CAT,GET etc.*#)(REMEMBER)

SIR: WHAT IS YOUR WEAKNESS?
ME: I GET FUSTRATED VERY EASILY.

IDIAL: I PUSH MY TEAMMATES TO DO WORK FAST.BUT I GOT TO KNOW THAT EVERYONES SPEED IS DIFFERENT SO I GIVE WORK TO THEM ACCORDINGLY.

THEIR AIM:--TO GET KNOW ABOUT YOUR WEAKNESS IS IT REALLY HARMFUL TO COMPANY,BUT WE SHOULD REPRESENT THEM AS T THOSE ARE OUR STRONG POINTS.END WITH BUT AND TELL WHAT YOU R DOING ABOUT RECOVERING FROM WEAKENESS

SIR: WHY SHOULD WE HIRE YOU?
ME: I'M BRILLIANT ,HARDWORKING.

IDIAL: I AM GOOD ORGANISER(AS I MENTIONED WRITE IN RESUME FAKE ACHIEVEMENT AS HEAD OF GAMING COMITY IN COLLEG EVENT . IT SHOWS YOUR ORGANISATIONAL QUALITY WHICH COMPANY WANTS.)I LIKE TO MAKE FRIENDS WHERE EVER I GO(THIS SHOWS YOUR ABILITY TO MIX UP WITH TEAM)I WAS CLASS REPRESENTATIVE IN LAST YEAR(THIS SHOWS YOUR LEADERSHIP QUALITY)

THEIR AIM:-- GOOD LEADER,GOOD TEAMMATE

SIR: DO YOU HAVE ANY QUESTIONS?
ME: HOW YOUR COMPANY IS GROWING SO FAST?

IDIAL : SAME(THIS QUESTION GIVE HONOUR TO THEM.THEY WILL GET HAPPY.)

SIR : WHY DO YOU WANT TO GET IN THIS COMPANY.
ME   THIS IS MY DREAM COMPANY .I THINK I CAN GROW WITH YOUR COMPANY MUCH FASTER.

IDIAL : SAME (THIS WILL BOOST YOUR IMAGE)

SIR: WHAT DO YOU EXPECT FROM COMPANY?
ME: FRIENDLY AND CHALLENGING ENVIRONMENT.

IDIAL: SAME..

GD
JUST STARTING EACH TIME OR SUMMARISING IS NOT SUFFICIENT .
TRY FOR BEST.
1. JUST SPEAK TWICE BUT SUCH THAT NONE WILL TALK AT THAT TIME .i.e. EVERYONE WILL LISTEN YOU.

2.JUST KEEP ON SHAKING YOUR HEAD TO SHOW YOUR LISTENING AND AGREE WITH HIM .SO AT YOUR TIME HE WILL CERTAINLY LISTEN YOU.

3.IF EVERYONE TRY TO SPEAK MAKING FISH MARKET THEN JUST KEEP ON SPEAKING"FRIENDS PLEASE CALM DOWN ,IT'S GETTING FISH MARKET. TRY TO SPEAK ONE AT A TIME . PLZ FRIENDS PLZ"

4. IF SOMEONE WANTS TO TALK BUT NOT GETTING CHANCE THEN RAISE YOUR VOICE N SAY"PLZ , ONE OF OUR FRIEND ALSO WANT TO SHARE SOMETHING"N THEN POINT YOUR HAND TOWARDS HIM (NOT FINGER)

5.TRY FOR START AND SUMMARISE(YES FOR BOTH)IF NOT POSIIBLE THEM MINIMUM SECONDLY.

I really used this at last n got placed on same day.I edited my resume n entered like "Completed Basic Course of Art Of Living(this was fake),Certified course of discover yourself (i had certificate)" and i was asked about that only in interview and got selected in CAPS GEMINI.

BEST   OF   LUCK(with confidence)
Mahendra

CISCO PLACEMENT PAPER ON 16th DECEMBER 2006 AT BANGALORE

Hai Guys,
I attend this paper on dec16

The written test consists of 50 questions in 60 minutes there may be different sets.

1-6 on quantitative problems very easy on basics
7-11 on general English a passage will be given and 4 sentences will be given as ans whether the data is sufficient, not sufficient, correct conclusion, full information not given.
12-22 picture reasoning such as guess the fifth one from the four figures
23-30 missing letters in a sequence of letters very easy.
<!--[if !supportLists]-->31-40   <!--[endif]-->two reasoning questions r given with some q below
41-50 some quantitative problems,3 qs on linux pl/sql ,c lang r given

TECHNICAL INTERVIEW :

1. ALL basics they asked me
2. Binary sort explain line by line
3. Insertion sort how does it differ from binary sort explain line by line (they provide rough sheets)
4. OSI layers and functions
5. Microcroprocessors
6. Tress, program on insertion of node in single linked list
7. Pre order, inorder,post order explain with examples
8. Sliding window protocol explain
9. Write the of a c program for printing numbers into words such as 123 (one hundred and twenty three)
10. About my project fully explained and its applications and some qs on that
11. Why cisco
12. What u know abt cisco

It has taken 1 hr 15 min to complete the techinal round And in hr its simple no qs for me they will explain abt the company.

CISCO PAPER ON 30th OCTOBER 2006 AT BANGALORE
50 questions,
20-general aptitude
20-electronics
10-networks and c.

duration -1hr

1) 28 shake hands were exchanged in a meeting, each person shakes hands with every other person only once.How many people were present in the meeting?

a. 14
b. 8
c. 56
d. i dont remember.

2) There are 27 balls with one ball of heavier weight than the other balls. wats the minimum number of weighs that can be made to determine the heavier ball?

a. 13
b. 4
c. 3
d. 2

3) Booksellors B1 B2 B3 and there are 5 secretaries S1, S2, S3, S4 and S5. A team must made with 2 boss, 3 secretaries by satisifying certain conditions.

- B1and S1 cannot be togather.
- S1 and S4 cannot be togather.
- B1 and B3 cannot be togather.
- S1 abd S3 cannot be togather.

Who MUST be present to make the team.
a. S1
b. B1
c. S4
d. B2

 few more aptitude questions like these...

4) The one that converts a high level language code to object form is

a. Compiler
b. Interpreter.
c. xxx
d. xxx

5) The routing is done at which layer?

a. network
b. Data link
c. transport.
d. application layer.

6) adding of 1111 and 1101 requires a

a. one FA and One Ha
b. three FA
c. Three FA and One HA
d. none of these.

7) Manchester code does
a. i dont remember options.

8) Zenier diode is a
a. current regulator.
b. voltage ....
c. Power regulator
d. Voltage regulator.

9) Lightning occurs in every 6 seconds, how many will occur in 3/4 in 1 hour.(question not framed properly)

many electronic related questions... as i am not an electronics student i dont remember them.

 By,
Mamatha. SECTION 1 -- BASIC DIGITAL SECTION

In order to find out stack fault of a three input nand gate how many necessary input vectors are needed ?

What is parity generation ?

A nand gate becomes ___ gate when used with negative logic ?

What is the advantage of cmos over nmos ?

What is the advantage of synchronous circuits over asynchronous circuits ?

What is the function of ALE in 8085 ?

A voice signal sample is stored as one byte. Frequency range is 16 Hz to 20 Hz. What is the memory size required to store 4 minutes voice signal?

What will the controller do before interrupting CPU?

In a normalized floating point representation, mantissa is represented using 24 bits and exponent with 8 bits using signed representation. What is range ?

The stack uses which policy out of the following-- LIFO, FIFO, Round Robin or none of these ?

Where will be the actual address of the subroutine is placed for vectored interrupts?

Give the equivalent Gray code representation of AC2H.

What is the memory space required if two unsigned 8 bit numbers are multiplied ?

The vector address of RST 7.5 in 8085 processor is _____.
Ans. 003C (multiply 7.5 by 8 and convert to hex)

Subtract the following hexadecimal numbers--- 8416 - 2A16

Add the following BCD numbers--- 1001 and 0100

How much time does a serial link of 64 Kbps take to transmit a picture with 540 pixels

Give the output when the input of a D-flip flop is tied to the output through the XOR gate.

How much time does a serial link of 64 Kbps take to transmit a picture with 540 pixels.

Give the output when the input of a D-flip flop is tied to the output through the XOR gate

 Implement the NOR gate as an inverter.

What is the effect of temperature on the Icb in a transistor

 What is the bit storage capacity of a ROM with a 512*4 organization?

What is the reason of the refresh operation in dynamic RAM's ?

Suppose that the D input of a flip flop changes from low to high in the middle of a clock pulse. Describe what happens if the flip flop is a positive edge triggered type?

How many flip flops are required to produce a divide by 32 device ?

An active HIGH input S-R latch has a 1 on the S input and a 0 on the R input. What state is the latch in?

Implement the logic equation Y = C^BA^ + CB^A + CBA with a multiplexer.
  (where C^ stands for C complement)

Equivalent Gray code representation of AC2H.

What does a PLL consist of ?

   II - Software Section

The starting location of an array is 1000. If the array[1..5/...4] is stored in row major order, what is the location of element [4,3]. Each word occupies 4 bytes

In a tertiary tree, which has three childs for every node, if the number of internal nodes are N, then the total number of leaf nodes are

Explain the term "locality of reference" ?

What is the language used for Artificial Intelligence
            Ans: lisp

What is the character set used in JAVA 2.0 ?
            Ans: Unicode

char a =0xAA ;
   int b ;
    b = (int) a ;
   b = b >> 4 ;
    printf("%x",b);
   What is the output of the above program segment ?

struct s1 { struct { struct { int x; } s2 } s3 }y; How does one access x in the above given structure definition ?

Why there is no recursion in Fortran ?
 Ans. There is no dynamic allocation.

What is the worst case complexity of Quick sort?
Ans. O(n2)

What will be sequence of operating system activities when an interrupt occurs ?

CISCO Y2K PAPER

1> The starting location of an array is 1000. If the array[1..5/...4] is stored
in row major order, what is the location of element [4][3]. Each work occupies
4 bytes.

2> If the number of leaves in a binary tree are N, then the total number of
internal nodes........(Assume complete binary tree)

ANS: N-1

3> The locality of reference means.............

4> If two ausigned 8 bit numbers are multiplied what is the memory space
required...............

5> The vector address of RST 7.5 is ....

ANS: 003C (multiply 7.5 by 8 and convert to hex)

6> int b = 0xAA;
b>>4;
printf("%x",b);

What is the output of the above program....

7> struct s1 { struct { struct {int x;}s2}s3}y;

How to access x? ANS: y.s3.s2.x

8> Why there is no recursion in Fortran?

ANS: There is no dynamic location (Check this)

9> What is the worst case complexity of Quick sort?

ANS: $O(n^2)$

10> Quick sort uses..............

Ans: Divide and conquer

11> In a sequential search, the time it takes to search through n elements is

12> What is the size of the array declared as double * X[5]

ANS: 5* sizeof (double *)

13> A binary search tree is given and asked to write the preorder traversal result.

14> If size of the physical memory is 2^32-1, then the size of virtual memory......

15> S-> A0B
A-> BB|0
B-> AA|1 How many strings of length 5 are possible with the above productions??

16> (3*4096+15*256+3*16+3). How many 1's are there in the binary representation of the result.

ANS: 10

17> In memory mapped I/O how I/O is accessed.............

ANS: Just like a memory location (Means, I/O devices can be accessed using the instructions like mov A,M etc...)

18> What is the use of ALE in 8085.......

ANS: To latch the lower byte of the address.

19> If the logical memory of 8 X 1024 is mapped into 32 frames, then the number of bits for the logical address ......

ANS: 13

20> Context free grammar is useful for...

ANS: If-then structures.

21> In ternary number representation, numbers are represented as 0,1,-1. Here -1 is represented as - (1 bar). Then how is 352/9 represented......
1

22> There are processors which take 4,1,8,1 machine cycles respectively. If these are executed in round robin fashion with a time quantum of 4, what is the

time it take for process 4 to complete....

ANS: 9 (10)

23> The minimum frequency of operation is specified for every processor because......

24> In memory mapped I/O, what will happen if a device is identified with a 16 bit address and enabled by memory related control signals.....

25> The reason for preferring CMOS over NMOS is....

Ans: Low power consumption.

26> Two binary numbers A,B are given and asked to find out A-B.

27> Each character is represented by 7 bits, 1 bit is used to represent error bit and another bit for parity. If total number of bits transmitted is 1200bits, then number of symbols that can be transmitted.......

28> One question about the setassociativity of cache..

29> Write the postfix form of the following expression...

A+[[(B+C)+(D+E)*F]/G]

30> What is the function of the linker......

31> void f(int y)
{
struct s *ptr;
ptr = malloc (sizeof (struct)+ 99*sizeof(int));
}

struct s{
int i;
float p;
};

when free(ptr) is executed, then what will happen??

Cisco Placement Paper

COMPUTER AWARENESS TEST

1.In the command scanf, h is used for

Ans. Short int

2.A process is defined as

Ans. Program in execution

3.A thread is

Ans. Detachable unit of executable code)

4.What is the advantage of Win NT over Win 95

Ans. Robust and secure

5.How is memory management done in Win95

Ans. Through paging and segmentation

6.What is meant by polymorphism

Ans. Redfinition of a base class method in a derived class

7.What is the essential feature of inheritance

Ans. All properties of existing class are derived

8.What does the protocol FTP do

Ans. Transfer a file b/w stations with user authentification

9.In the transport layer ,TCP is what type of protocol

Ans. Connection oriented

10.Why is a gateway used

Ans. To connect incompatible networks

11.How is linked list implemented

Ans. By referential structures

12.What method is used in Win95 in multitasking

Ans. Non preemptive check

13.What is meant by functional dependency

14.What is a semaphore

Ans. A method synchronization of multiple processes

15.What is the precedence order from high to low ,of the symbols ( ) ++ /

Ans.( ) , ++, /

16.Preorder of A*(B+C)/D-G

Ans.*+ABC/-DG

18. B-tree (failure nodes at same level)

19. Dense index (index record appers for every search -key in file)

20.What is the efficiency of merge sort

Ans. O(n log n)

21.A program on swaping (10,5)was given *(candidate cannot recollect)*

22.In which layer are routers used

Ans.In network layer

23.In which layer are packets formed (in network layer)

24.heap (priority queue)

25.copy constructor (constant reference)

26.Which of the following sorting algorithem has average sorting behavior --
   Bubble sort,merge sort,heap sort,exchange sort

Ans. Heap sort

27.In binary search tree which traversal is used for getting ascending order values--
Inorder ,post order,preorder

Ans.Inorder

28.What are device drivers used for

Ans.To provide software for enabling the hardware

29. Irrevalent to unix command (getty)

30.What is fork command in unix

Ans. System call used to create process

31.What is make command in unix

Ans. Used forcreation of more than one file

32.In unix .profile contains

Ans. Start up program

33.In unix echo is used for (answer C)

34.In unix 'ls 'stores contents in

Ans.inode block

QUANTITATIVE SECTION

1.In a class composed of x girls and y boys what part of the class is composed of girls

A.y/(x + y)
B.x/xy
C.x/(x + y)
D.y/xy

Ans.C

2.What is the maximum number of half-pint bottles of cream that can be filled with a 4-gallon can of cream(2 pt.=1 qt. and 4 qt.=1 gal)

A.16
B.24
C.30
D.64

Ans.D

3.If the operation,^ is defined by the equation x ^ y = 2x + y,what is the value of a in 2 ^ a = a ^ 3

A.0
B.1
C.-1
D.4

Ans.B

4.A coffee shop blends 2 kinds of coffee,putting in 2 parts of a 33p. a gm. grade to 1 part of a 24p. a gm.If the mixture is changed to 1 part of the 33p. a gm. to 2 parts of the less expensive grade,how much will the shop save in blending 100 gms.

A.Rs.90
B.Rs.1.00
C.Rs.3.00
D.Rs.8.00

Ans.C

5.There are 200 questions on a 3 hr examination.Among these questions are 50 mathematics problems.It is suggested that twice as much time be spent on each maths problem as for each other question.How many minutes should be spent on mathematics problems

A.36
B.72
C.60
D.100

Ans.B

6.In a group of 15,7 have studied Latin, 8 have studied Greek, and 3 have not studied either.How many of these studied both Latin and Greek

A.0
B.3
C.4
D.5

Ans.B

7.If $13 = 13w/(1-w)$,then $(2w)^2 =$

A.1/4
B.1/2
C.1
D.2

Ans.C

8. If a and b are positive integers and (a-b)/3.5 = 4/7, then

(A) b < a
(B) b > a
(C) b = a
(D) b >= a

Ans. A

9. In june a baseball team that played 60 games had won 30% of its game played. After a phenomenal winning streak this team raised its average to 50% .How many games must the team have won in a row to attain this average?

A. 12
B. 20
C. 24
D. 30

Ans. C

10. M men agree to purchase a gift for Rs. D. If three men drop out how much more will each have to contribute towards the purchase of the gift/

A. D/(M-3)
B. MD/3
C. M/(D-3)
D. 3D/(M^2-3M)

Ans. D

11. A company contracts to paint 3 houses. Mr.Brown can paint a house in 6 days while Mr.Black would take 8 days and Mr.Blue 12 days. After 8 days Mr.Brown goes on vacation and Mr. Black begins to work for a period of 6 days. How many days will it take Mr.Blue to complete the contract?

A. 7
B. 8
C. 11
D. 12

Ans.C

12. 2 hours after a freight train leaves Delhi a passenger train leaves the same station travelling in the same direction at an average speed of 16 km/hr. After travelling 4 hrs the passenger train overtakes the freight train. The average speed of the freight train was?

A. 30
B. 40
C.58
D. 60

Ans. B

13. If 9x-3y=12 and 3x-5y=7 then 6x-2y = ?

A.-5
B. 4
C. 2
D. 8

Ans. D

ANALYTICAL ABILITY

1. *The office staff of XYZ corporation presently consists of three bookeepers--A, B, C and 5 secretaries D, E, F, G, H. The management is planning to open a new office in another city using 2 bookeepers and 3 secretaries of the present staff . To do so they plan to seperate certain individuals who don't function well together. The following guidelines were established to set up the new office*

I. Bookeepers A and C are constantly finding fault with one another and should not be sent together to the new office as a team
II. C and E function well alone but not as a team , they should be seperated
III. D and G have not been on speaking terms and shouldn't go together
IV Since D and F have been competing for promotion they shouldn't be a team

1.If A is to be moved as one of the bookeepers,which of the following cannot be a possible working unit.

A.ABDEH
B.ABDGH
C.ABEFH

D.ABEGH

Ans.B

2.If C and F are moved to the new office,how many combinations are possible

A.1
B.2
C.3
D.4

Ans.A

3.If C is sent to the new office,which member of the staff cannot go with C

A.B
B.D
C.F
D.G

Ans.B

4.Under the guidelines developed,which of the following must go to the new office

A.B
B.D
C.E
D.G

Ans.A

5.If D goes to the new office,which of the following is/are true

I.C cannot go
II.A cannot go
III.H must also go

A.I only
B.II only
C.I and II only
D.I and III only

Ans.D

2.*After months of talent searching for an administrative assistant to the president of the college the field of applicants has been narrowed down to 5--A, B, C, D, E .It was announced that the finalist would be chosen after a series of all-day group personal interviews were held.The examining committee agreed upon the following procedure*

I.The interviews will be held once a week
II.3 candidates will appear at any all-day interview session
III.Each candidate will appear at least once
IV.If it becomes necessary to call applicants for additonal interviews, no more 1 such applicant should be asked to appear the next week
V.Because of a detail in the written applications,it was agreed that whenever candidate B appears, A should also be present.
VI.Because of travel difficulties it was agreed that C will appear for only 1 interview.

1.At the first interview the following candidates appear A,B,D.Which of the follwing combinations can be called for the interview to be held next week.

A.BCD
B.CDE
C.ABE
D.ABC

Ans.B

2.Which of the following is a possible sequence of combinations for interviews in 2 successive weeks

A.ABC;BDE
B.ABD;ABE
C.ADE;ABC
D.BDE;ACD

Ans.C

3.If A ,B and D appear for the interview and D is called for additional interview the following week,which 2 candidates may be asked to appear with D?

I. A
II B
III.C
IV.E

A.I and II
B.I and III only
C.II and III only
D.III and IV only

Ans.D

4.Which of the following correctly state(s) the procedure followed by the search committee

I.After the second interview all applicants have appeared at least once
II.The committee sees each applicant a second time
III.If a third session,it is possible for all applicants to appear at least twice

A.I only
B.II only
C.III only
D.Both I and II

Ans.A

3. *A certain city is served by subway lines A,B and C and numbers 1 2 and 3*
When it snows , morning service on B is delayed
When it rains or snows , service on A, 2 and 3 are delayed both in the morning and afternoon
When temp. falls below 30 degrees farenheit afternoon service is cancelled in either the A line or the 3 line,
but not both.
When the temperature rises over 90 degrees farenheit, the afternoon service is cancelled in either the line C or the
3 line but not both.
When the service on the A line is delayed or cancelled, service on the C line which connects the A line, is delayed.
When service on the 3 line is cancelled, service on the B line which connects the 3 line is delayed.

Q1. On Jan 10th, with the temperature at 15 degree farenheit, it snows all day. On how many lines will service be
     affected, including both morning and afternoon.

(A) 2
(B) 3
(C) 4
(D) 5

Ans. D

Q2. On Aug 15th with the temperature at 97 degrees farenheit it begins to rain at 1 PM. What is the minimum number
   of lines on which service will be affected?

(A) 2
(B) 3
(C) 4
(D) 5

Ans. C

Q3. On which of the following occasions would service be on the greatest number of lines disrupted.

(A) A snowy afternoon with the temperature at 45 degree farenheit
(B) A snowy morning with the temperature at 45 degree farenheit
(C) A rainy afternoon with the temperature at 45 degree farenheit
(D) A rainy afternoon with the temperature at 95 degree farenheit

Ans. B

4. *In a certain society, there are two marriage groups, red and brown. No marriage is permitted within a group. On marriage, males become part of their wives groups; women remain in their own group. Children belong to the same group as their parents. Widowers and divorced males revert to the group of their birth. Marriage to more than one person at the same time and marriage to a direct descendant are forbidden*

Q1. A brown female could have had

I. A grandfather born Red
II. A grandmother born Red
III Two grandfathers born Brown

(A) I only
(B) III only
(C) I, II and III
(D) I and II only

Ans. D

Q2. A male born into the brown group may have

(A) An uncle in either group
(B) A brown daughter
(C) A brown son
(D) A son-in-law born into red group

Ans. A

Q3. Which of the following is not permitted under the rules as stated.

(A) A brown male marrying his father's sister
(B) A red female marrying her mother's brother
(C) A widower marrying his wife's sister
(D) A widow marrying her divorced daughter's ex-husband

Ans. B

Q4. If widowers and divorced males retained their group they had upon marrying which
of the following would be permissible (Assume that no previous marriage occurred)

(A) A woman marrying her dead sister's husband
(B) A woman marrying her divorced daughter's ex-husband
(C) A widower marrying his brother's daughter
(D) A woman marrying her mother's brother who is a widower.

Ans. D

5. I. All G's are H's
II. All G's are J's or K's
III All J's and K's are G's
IV All L's are K's
V All N's are M's
VI No M's are G's

Q1. If no P's are K's which of the following must be true

(A) No P is a G
(B) No P is an H
(C) If any P is an H it is a G
(D) If any P is a G it is a J

Ans. D

Q2. Which of the following can be logically deduced from the stated conditions

(A) No M's are H's
(B) No H's are M's
(C) Some M's are H's
(D) No N's are G's

Ans. D

Q3. Which of the following is inconsistent with one or more conditions

(A) All H's are G's
(B) All H's are M's
(C) Some H's are both M's and G's
(D) No M's are H's

Ans. C

Q4. The statement "No L's are J's" is

I. Logically deducible from the conditions stated
II Consistent with but not deducible from the conditions stated
III. Deducible from the stated conditions together with the additional statements "No J's are K's"

(A) I only
(B) II only
(C) III only
(D) II and III only

Ans. D

Cisco Placement paper

SECTION 1 -- DIGITAL SECTION

 1. In order to find out stack fault of a three input nand gate how many necessary input

vectors are needed ?

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9. In a normalised floating point representation, mantissa is represented using 24 bits and exponent with 8 bits using signed representation. What is range ?

10. The stack uses which policy out of the following-- LIFO, FIFO, Round Robin or none of these ?

11. Where will be the actual address of the subroutine is placed for vectored interrupts?

12. Give the equivalent Gray code reprasentation of AC2H.

13.What is the memory space required if two unsigned 8 bit numbers are multiplied ?

14. The vector address of RST 7.5 in 8085 processor is _____.

Ans. 003C (multiply 7.5 by 8 and convert to hex)

15. Subtract the following hexadecimal numbers--- 8416 - 2A16

16. Add the following BCD numbers--- 1001 and 0100

17. How much time does a serial link of 64 Kbps take to transmit a picture with 540

pixels.

18. Give the output when the input of a D-flip flop is tied to the output through the XOR gate.

19. Simplify the expression AB + A(B + C) + B (B + C)

20. Determine the logic gate to implement the foolowing terms--ABC, A+B+C
21. Implement the NOR gate as an inverter.

22. What is the effect of temperature on the Icb in a transistor

23. What is the bit storage capacity of a ROM with a 512*4 organisation?

24. What is the reason of the refresh operation in dynamic RAM's ?

25. Suppose that the D input of a flip flop changes from low to high in the middle of a clock pulse.Describe what happens if the flip flop is a positive edge triggered type?

26. How many flip flops are required to produce a divide by 32 device ?

27. An active HIGH input S-R latch has a 1 on the S input and a 0 on the R input. What state is the latch in?

28. Implement the logic equation Y = C^BA^ + CB^A + CBA with a multiplexer.
(where C^ stands for C complement)

29.Equivalent Gray code reprasentation of AC2H.

30. What does a PLL consist of ?

We advice you to know the design of PLL as questions pertaining to this may be asked

SECTION 2 - SOFTWARE SECTION
1. The starting location of an array is 1000. If the array[1..5/...4] is stored in row major order, what is the location of element [4,3]. Each word occupies 4 bytes.

2. In a tertiary tree, which has three childs for every node, if the number of internal nodes are N, then the total number of leaf nodes are

3. Explain the term "locality of reference" ?

4. What is the language used for Artificial Intelligence
Ans: lisp

5. What is the character set used in JAVA 2.0 ?
Ans: Unicode

6. char a =0xAA ;
int b ;
b = (int) a ;
b = b >> 4 ;
printf("%x",b);

What is the output of the above program segment ?

7. struct s1 { struct { struct { int x; } s2 } s3 }y;
How does one access x in the above given structure definition ?

8. Why there is no recursion in Fortran ?

Ans. There is no dynamic allocation.

9. What is the worst case complexity of Quick sort?

Ans. $O(n2)$

10. What will be sequence of operating system activities when an interrupt occurs ?

11. In a sequential search, what is the average number of comparisons it takes to search through n elements ?

Ans: $(n+1)/2$.

12. What is the size of the array declared as double * X[5] ?

Ans. 5 * sizeof (double *)

13. A binary search tree with node information as 1,2,3,4,5,6,7,8 is given. Write the result obtained on preorder traversal of the binary search tree ?

Ans : 53124768

14. If size of the physical memory is 232-1, then what is the size of the virtual memory ?

15. S -> A0B
A-> BB|0
B-> AA|1
How many strings of length 5 are possible with the above productions?

16. (3*4096+15*256+3*16+3). How many 1's are there in the binary representation of the result ?

Ans. 10

17. In memory mapped I/O how is I/O is accessed ?

18. What is the use of ALE in 8085 ?

Ans To latch the lower byte of the address.

19. If the logical memory of 8 X 1024 is mapped into 32 frames, then the number of bits for the logical address are_____ ?

Ans. 13

20. Context free grammar is useful for which purpose ?

21. In ternary number representation, numbers are represented as 0,1,-1.(Here -1 is represented as 1 bar.) How is 352/9 represented in ternary number representation?

22. There are processes which take 4,1,8,1 machine cycles respectively. If these are executed in round robin fashion with a time quantum of 1, what is the time it take for process 4 to complete ?

Ans. 9

23. The minimum frequency of operation is specified for every processor because......
a)for interfacing slow peripherals
b)dynamic memory refreshing.
c)to make compatible with other processor.

24. For linked list implementation , which search is not applicable ?

 Ans: Binary search.

 25. Each character is represented by 7 bits, 1 bit is used to represent error bit and another bit for parity. If total number of bits transmitted is 1200 bits, then what is the number of symbols that can be transmitted ?

 Ans: 133

26. Explain set associativity of cache ?

27. Write the postfix form of the following expression .
A+[[(B+C)+(D+E)*F]/G]

28. What is the function of the linker?

29. void f(int y)
{
struct s *ptr;
ptr = malloc (sizeof (struct)+99*sizeof(int));
}

struct s{
int i;
float p;
};

when free (ptr) is executed, then what will happen?

30. To concatenate two linked lists strings, the order is O(1) is obtained for what kind of list?

Cisco test Conducted on 17th sunday october at bangalore there were almost 40 technical questions and 10 analytical questions..total 50 questions..

Analytical questions

1.   find perimeter of a trapezium wit 3 sides given and distance b/w parallel sides given...

2.   A triangle ABC is given, a line DE is paralel to base side and that cuts the triangle.. the ratio of area of triangle to the area of trapezium .given DE/BC=3/5..

3.   four concentric circles r given .the radius of 1st circle is x.next is 2x,then 3x and 4x. given that area b/w 2nd and 1st is A and 4th and 3rd circles being B.find ratio of A to B

4.   difference b/w the perimeteres of two concentric circles is 66.find the difference b/w radius..
ans 10.5

5.   3/p=6,3/q=15......find p-q

Technical questions.....

6.   #define clrscr() 100
 main()
  {
  clrscr();
  printf("%d",clrscr());
  }

7.   which of the followin is used for avoidin network congestion

  bufferin

  cachin

  sourcequench

  all of de above

8.   main()

 {

 int a;

 printf("%d",scanf(%d,&a));

 }

wats o/p of this pgm..wat will b printed

ans :0

9.   main()

  {

  printf("as");

  printf("\bhi");

  printf("is\n");

  } wat will b printed.

10.   main()

  {

  unsigned short a=-1;

  unsigned char b=a;

  printf("%d %d ",a,b);

  }

  wat is o/p of the program

a. 65535 -1

b. 65535 65535

c. -1 -1

11.   arrays base address is 1000....array is a[5][4]..then wat is de

correct address of a[4][3]...

ans:1056

12.   one packet is 64bytes..no of pkts send is 16000..then total no of bytes

send is

ans 1024000

13.   #define maxval 5

int main (void)

```
 {
  int i=1;
  if(i-maxval)
   {
    printf("inside");
    }
else
  {
   printf("out");
  }
```

find o/p???

14.   #define a 3+3

#define b 11-3

main()

```
{
 printf("%d",a*b);
}
```

wat is o/p?????

15.   A question in which segment address is given ..logical address

is 800..base addresses also given ..u hav 2 find physical address..

16.   There was a question on processor speed in nanocycles..then it performs

a instruction in x cycles..dont remember

17.   main()
 {
 int *i;
 int s=(int *)malloc(10*sizeof(int));
 for (i=0;i<10;i++)
  {
    printf("%d",i*i)
  }
wats o/p

Cisco Placement Sample Test Paper

Some Sample questions (m.tech.) tech.--24, apti.--20

1.   On cmos power(formula- P=CV*Vf

2.   Lowest noise margin in which logic family--
a) TTL   b) CMOS   c)   biCMOS   d)   all have same

3.   If CMOS has tr(rise time)=tf.find Wp/Wn. given beta(n)=2*beta(p)

4.   gm of a transistor is proportional to
a)Ic b)Vt c)1/Vt d)none

5.   If A and B are given in 2's complement find A-B in decimal.

6.   Set up time,hold time ,clock to Q delay time (very important)

7.   .3 questions on opamp (transfer function)(2 marks each)

8.   2 questions on sequence detector (2 marks each)

9.   Logic function boolean expressions(true/false) (3 question-1 mark each)probabily all false

10.   In I/O mapped how do you represent memory(1 mark)

11.   The design of FSM(finite state machine) will--
  a) increase time of design

b) increase delay

c) increase power

d) all of the above

12.   K-map minimization

13.   Phase locked loop(PLL) 1 question sachin

Cisco Sample Question Paper

1.   The starting location of an array is 1000. If the array[1..5/...4] is stored in row major order, what is the location of element[4][3]. Each work occupies 4 bytes.

2.   If the number of leaves in a binary tree are N, then the total number of internal nodes........(Assume complete binary tree)
ANS: N-1

3.   The locality of reference means.............

4.   If two ausigned 8 bit numbers are multiplied what is the memory space required...............

5.   The vector address of RST 7.5 is ....
ANS: 003C (multiply 7.5 by 8 and convert to hex)

6.   int b = 0xAA;
b>>4;
printf("%x",b);
What is the output of the above program....

7.   struct s1 { struct { struct {int x;}s2}s3}y;
How to access x? ANS: y.s3.s2.x

8.   Why there is no recursion in Fortran?

ANS: There is no dynamic allocation

9.   What is the worst case complexity of Quick sort?

ANS: $O(n^2)$

10. Quick sort uses..............

Ans: Divide and conquer

11. In a sequential search, the time it takes to search through n elements is

12. What is the size of the array declared as double * X[5]

ANS: 5* sizeof (double *)

13. A binary search tree is given and asked to write the preorder traversal result.

14. If size of the physical memory is $2^{32}-1$, then the size of virtual memory......

15. S-> A0B

A-> BB|0

B-> AA|1 How many strings of length 5 are possible with the above productions??

16. (3*4096+15*256+3*16+3). How many 1's are there in the binary representation
of the result.

ANS: 10

17. In memory mapped I/O how I/O is accessed.............

ANS: Just like a memory location (Means, I/O devices can be accessed using the
instructions like mov A,M etc...)

18. What is the use of ALE in 8085.......

ANS: To latch the lower byte of the address.

19. If the logical memory of 8 X 1024 is mapped into 32 frames, then the number of bits for the logical address ......

ANS: 13

20. Context free grammar is useful for...

ANS: If-then structures.

21. In ternary number representation, numbers are represented as 0,1,-1. Here -1 is represented as - (1 bar). Then how is 352/9 represented......

22. There are processors which take 4,1,8,1 machine cycles respectively. If these are executed in round robin fashion with a time quantum of 4, what is the time it take for process 4 to complete....

ANS: 9

23. The minimum frequency of operation is specified for every processor because......

24. In memory mapped I/O, what will happen if a device is identified with a 16 bit address and enabled by memory related control signals.....

25. The reason for preferring CMOS over NMOS is....

Ans: Low power consumption.

26. Two binary numbers A,B are given and asked to find out A-B.

27. Each character is represented by 7 bits, 1 bit is used to represent error bit and another bit for parity. If total number of bits transmitted is 1200bits, then number of symbols that can be transmitted.......

28. One question about the setassociativity of cache..

29. Write the postfix form of the following expression...
A+[[(B+C)+(D+E)*F]/G]

30. What is the function of the linker......

31. void f(int y)

  {

  struct s *ptr;

  ptr = malloc (sizeof (struct)+ 99*sizeof(int));

  }

  struct s{

  int i;

  float p;

  };

  when free(ptr) is executed, then what will happen??

system concepts:

1. int a[5,6]

   how much memory will be allocated

2. char p[6];

   char *d[10];

   ans:d=(char*)p

3. using LFU algorithm,how many page faults will occur of the pages r

   1,2,1,3,4.

   ans:1,4

4. in which layer the bridges r used.

   a)data link layer

   b)session layer

   c)physical layer

   d)network layer

5. #define d 10+10

   main()

   { printf("%d",d*d);

   }

6. in a complete binary tree if the number of levels r 4 then the number of nodes will be,

7. if we delete a node from a balanced binary tree,how can we retain the properties of balanced binary tree.

   ans: by rotation at the nodes.

8. in a k-way search tree with N keys, the number of node/no. of leaves=

9. s->A0B

   A->BB|1

   B->AA|0

   how many string can be constructed with length 5.

10. in which of the following regular expression the srting contains atleast 2 concetive 1's.

    ans:(0+10)*||(0+1)*

11. int i,j=1;

    for(i=0;i<10;i++);

    {

    j=j+1;

    }

    printf("%d %d",i,j);

    ans:10 11

12. static char *i;

    i=malloc(sizeof(char));

find the error;

ans:malloc returns void

13. virtual memory address capacity depends on--

14. main()

{ int i=1;

fork();

fork();

fork();

printf("%d",i);

}

how many times i will be printed

ans:8

15. question on threads

16. int i=0xaa

char *p;

p=(char *)i;

p=p>>4;

printf("%x",p);

ans:0x000000a;

17. union

{ char *p;

int i;

char b;

}

main()

{

--

p=(char*)malloc(8*sizeof(char));

}

what is the size of union?

18. enum{sunday=-1,monday,...saturday}

printf("%d %d",sizeof(wednesday),wednesday);

19. struct x{

struct{

struct{

char ch;

} x;

}};

ans:definition wrong

20. struct *s;

s=(struct *)malloc(10*sizeof(struct)+90*sizeof(int));

free(s);

ans:total memory deallocated

21. one alogrithm is given:

ans:10395

22. func()

{ int x=1;

if(x=1)

x=1000;

else

x=10;

return x;

}

what is the return value?

ans:1000