**ADITI TECHNOLOGIES**

**SECTION 1-APTITUDE**

**Directions for question 1-10:**

Each question comprises four scattered segments of a sentence. Identify from among the four choices the sequences that correctly assembles the segments and completes the sentence.

1. A. Anniversaries can be dicey things.  
     B. As long as the dead are being commemorated on a particular day, it is fine.  
     C. The opposition could keep its gun powder dry and ready as well.  
     D. But when it comes to a government celebrating a year or two in office, there can be trouble.

(a) DACB   
(b) CADB   
(c) ABDC   
(d) BCDA  
  
  
2.  A. It is less concerned with telling a tale.  
     B. As with so much Huxley's later fiction, one is not sure whether or not to call this book a true novel.  
     C. It is also weak on characterization but strong on talk.  
     D. Than with presenting an attitude of life.

(a) CBDA   
(b) BADC   
(c) ABDC   
(d) DCBA  
  
  
3.  A. While the above is true for private sector companies, it is not so in the public limited companies.  
     B. But with the removal of control over premia, the premia at which issues are marked has gone up quite sharply.  
     C. So the cost of capital at even a lower debt equity ratio comes out lower.  
     D. Traditionally, the cost of equity is higher than the cost of debt.

(a) DBCA   
(b) BADC   
(c) ACDB   
(d) CDAB  
  
  
4.  A. Compiling and debugging.  
     B. Testing.  
     C. Writing the code.  
     D. Thinking of the algorithm.  
     E. Understanding the problem

(a) DBECA    
(b) CDABE   
(c) ACDBE   
(d) EDCAB  
  
  
5.  A. Such alliances are shaky from the start.  
     B. In this manner parties which are not able to get a mandate from the electorate are able to come to power.  
     C. We have seen the unique spectacle of political forming alliance just to form a government.  
     D. Indian democracy continues to amaze.  
  
(a) ADBC   
(b) BADC   
(c) DCBA  
(d) BDCA  
  
  
6.  A. They are the three faces of dysphoria - bad feeling.  
     B. Anxiety, Depression and Anger.  
     C. When the three combine and get out of control, we get what is called mental illness.  
     D. All of us experience three emotions almost daily.

(a) ACDB   
(b) CBDA   
(c) CADB   
(d) DBAC  
  
  
7.  A. This is the key to tap the creative power inside us.  
     B. It is difficult to control our thinking and feelings.  
     C . That is, unless we work at it conciously and persistently.  
     D. We are influenced and limited by attitudes, prejudices by other individuals and by external conditions to such an extent that few can control mental and emotional processes.  
  
(a) ACDB   
(b) BDCA   
(c) CADB  
(d) DBAC  
  
  
8. A. Two vital facts must be understood.  
    B. The subconscious mind has the power to create.  
    C. The second is that it obeys the orders given to it by the conscious mind.  
    D. Its function is to bring to full expression whatever is desired by the conscious mind.

(a)ABCD   
(b) CBDA   
(c) ADBC   
(d) DBAC  
  
  
9.  A. But what is not often understood is that this flash is outcome of long periods of incubation.  
     B. The layman thinks that it is a spell of divine flash which illuminates the dark and the hidden.  
     C. True, it does.  
     D. Inspiration is much misunderstood term.

(a) DBAC   
(b) ACBD   
(c) DBCA   
(d) CADB  
  
  
10.  A. As a result, the world has undergone a transformation.  
       B. Science and civilization have made rapid strides especially in recent times.  
       C. This constitutes the basic factor in the use of productive resources.  
       D. But behind all the progress of mankind is the human factor which is invaluable and irreplaceable.  
  
(a) ABDC   
(b) BADC   
(c) DCAB   
(d) CBDA  
  
  
**Directions for questions 11-20:** Each problem contains a question and two statements giving certain data. You have to select the correct answer from (a) to (d) depending on the sufficiency of the data given in the statements to answer the question. Mark your answer as   
(a) If statement (I) alone is sufficient.  
(b) If statement (II) alone is sufficient.  
(c) If both (I) and (II) together are sufficient but neither of statements alone is sufficient.  
(d) Either of the statements (I) and (II) is sufficient.  
(e) If statements (I) and (II) together are not sufficient.  
  
  
11. What is the distance from City A to City C in kms?  
(I) City A is 90 kms from City B.  
(II) City B is 30 kms from City C.  
  
  
12. Is z less than w? z and w are real numbers.  
(I) z2 = 25  
(II) w = 9  
  
  
13. The value of an estate in January 1905 started gradually declining in such a way that at the end of each year it was worth only x times its value at the beginning of the year. What was its worth in end December 1910 ?  
(I) It was worth Rs.10,109 in the end of December 1906.  
(II)It was worth Rs.12,345 in the beginning of January 1905.  
  
  
14. In an election, 3 candidates A,B and C were representing for a membership of parliament. How many votes did each receive?  
(I)  A received 1006 votes more than B and 1213 more votes than C.  
(II) Total votes cast were 15,414.  
  
  
15. John studies Chinese in a school. Which school does he attend?  
(I) All students in Jefferson High school take French.  
(II) Maysville High School offers only Chinese.  
  
  
16. How many girls passed the entrance exam this year?  
(I) Last year 560 girls passed  
(II) This year there was a 10% decrease over last year in the number of failures.  
  
  
17. What is Raju's age?  
(I) Raju, Vimala and Kishore are all of the same age.  
(II) Total age of Vimala, Kishore and Abishek is 32 and Abishek is as old as Vimala and Kishore together.  
  
  
18. Is Sreedhar eligible for an entry pass to the company premisers?  
(I) The company does not allow strangers to enter the company.  
(II)All employees are elgible to get a pass.  
  
  
19. Among five friends who is the tallest?  
(I) D is taller than A and C.  
(II)B is shorter than E but taller than D.  
  
  
20. Can a democratic system operate without effective opposition?  
(I) The opposition is indispensable.  
(II) A good statesman always learns more from his opponents than from  
his fervent supporters.  
  
  
**Directions for question 1-2 : Answer the questions based on the passage above them**  
  
A temple has 3 gateways, each of them is leading you into the temple, and at the end of each gateway there is an idol and as a devotee passes through the gateway with some flowers the number of flowers double. Ram enters the 1st gateway with some flowers and he puts same number of flowers at each idol and the end he is left with none.  
  
21. How many flowers did Ram start with?  
  
(a) 4   
(b) 5   
(c) 3   
(d) 7  
  
  
22. How many flowers does he put at each idol?  
  
(a) 10   
(b) 8   
(c) 6   
(d) 5  
  
**Directions for question 3-5 : Answer the questions based on the passage above them**  
  
Liz, Jenni, Jolie and Rick have an English final on Friday and they all would like to study together at least once before the test.  
Liz can study only on Monday, Tuesday and Wednesday nights and Thursday afternoon and night.  
Jenni can study only on Monday, Wednesday and Thursday nights and Tuesday afternoon and night.  
Jolie can study only on Wednesday and Thursday nights, Tuesday afternoon and Monday afternoon and night.  
Rick can study the afternoons and nights of Tuesday, Wednesday and Thursday, and on Monday afternoon.  
  
23.  If the group is to study twice, then the days could be  
(a) Monday and Wednesday   
(b) Tuesday and Thursday   
(c) Wednesday and Thursday  
(d) Monday and Friday  
(e) Tuesday and Wednesday

24. If three of them tried to study together when all four couldn't  
(a) this would be possible twice  
(b) it would have to be on Wednesday night  
(c) Rick could not attend the three person groups  
(d) This could be accomplised on Monday and Tuesday only  
(e) This would not be possible  
  
  
25. If Liz decided to study every night,  
(a) she would never be able to study with Rick  
(b) she would never be able to study with Jolie  
(c) she would have at least two study partners each night  
(d) she would have to study alone on Monday night  
(e) she would study with only Jenni on Thursday night

**SECTION 2-COMPUTER AWARENESS (15 questions)**

**NOTE**: The questions are of multiple choice format in the paper

1. What is the number of functions of a three variable boolean function?   
  
2. Which is the most commonly used replacement algorithm?   
Ans. LRU  
  
3. Which memory management technique involves dividing the memory into fixed sized blocks?  
Ans. Paging  
  
4. What is video resolution ?  
  
5. The processing speed of a microprocessor depends on \_\_\_\_\_?  
Ans. data bus width

**SECTION 3: C TEST**

**NOTE**: The questions are of multiple choice format in the paper

1. What is the output of the program given below

#include<stdio.h>  
     main()  
    {  
       char i=0;  
       for(;i>=0;i++) ;  
       printf("%d\n",i);  
    }   
  
  
2. What is the output of the following program

#include<stdio.h>  
   main()  
     {  
       int i=0;  
       fork();  
       printf("%d",i++);  
       fork();  
      printf("%d",i++);  
      fork();  
      wait();  
     }  
  
  
3. What is the memory allocated by the following definition ?  
  int (\*x)[10];  
  
  
4. What is the memory allocated by the following definition ?   
int (\*x)();  
  
  
5. In the following program segment

#include<stdio.h>  
     main()  
    {  
      int a=2;  
      int b=9;  
      int c=1;  
     while(b)  
  {  
     if(odd(b))  
     c=c\*a;  
    a=a\*a;  
    b=b/2;  
  }  
printf("%d\n",c);  
}  
  
How many times is c=c\*a calculated?  
  
  
6. In the program segment in question 5 what is the value of a at the end of the while loop?  
  
  
7. What is the output for the program given below   
  
     typedef enum grade{GOOD,BAD,WORST,}BAD;  
     main()  
    {  
        BAD g1;  
        g1=1;   
        printf("%d",g1);  
     }

8. Give the output for the following program.

#define STYLE1 char  
      main()  
     {  
      typedef char STYLE2;  
     STYLE1 x;  
     STYLE2 y;  
     clrscr();  
     x=255;  
     y=255;  
     printf("%d %d\n",x,y);  
     }  
  
  
9. Give the output for the following program segment.   
  
#ifdef TRUE  
int I=0;  
#endif  
  
main()  
{  
int j=0;  
printf("%d %d\n",i,j);  
}  
  
  
10. In the following program

#include<stdio.h>  
main()  
{  
char \*pDestn,\*pSource="I Love You Daddy";  
pDestn=malloc(strlen(pSource));  
strcpy(pDestn,pSource);  
printf("%s",pDestn);  
free(pDestn);  
}  
  
(a)Free() fails  
(b)Strcpy() fails  
(c)prints I love You Daddy  
(d)error  
  
  
11. What is the output for the following program  
  
     #include<stdio.h>  
       main()  
      {  
      char a[5][5],flag;  
      a[0][0]='A';  
      flag=((a==\*a)&&(\*a==a[0]));  
      printf("%d\n",flag);  
      }