**Programming In C Question Bank**

**PROGRAM TO DISPLAY ASCII CODE OF A CHARACTER AND VICE VERSA.**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**char india;**

**int v;**

**clrscr();**

**printf("ENTER A CHARACTER ");**

**scanf("%c",&india);**

**v=india;**

**printf("CHARACTER %c\n",india);**

**printf("ASCII VALUE %d\n",v);**

**getch();**

**}**

**MACRO**

**PROGRAM TO DEFINE A MACRO.**

**#include<stdio.h>**

**#include<conio.h>**

**#define pi 3.14**

**#define area\_circle(r) pi\*r\*r**

**void main()**

**{**

**float radius,area=0.0;**

**clrscr();**

**printf("ENTER RADIUS ");**

**scanf("%f",&radius);**

**area=area\_circle(radius);**

**printf("THE AREA OF CIRCLE IS %f",area);**

**getch();**

**}**

**FIND OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**unsigned int ii=-1;**

**clrscr();**

**printf("%d \n",ii); //-1**

**printf("%u \n",ii); //65535**

**getch();**

**}**

**FIND OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int a=10;**

**clrscr();**

**a <<= 1; //Shift Left 1010 1 Bit, Ans Will Be 20**

 **//Because 10100 After Shift**

**printf("%d \n",a);**

**getch();**

**}**

**FIND OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**clrscr();**

**printf("%d",printf("GTBIT")); //GTBIT5 , 5 BECAUSE**

**//GTBIT CONTAINS 5 CHARACTERS**

**getch();**

**}**

**FIND THE OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int i,j;**

**clrscr();**

**i=10;**

**j=i++;**

**printf("%d",j); //10**

**getch();**

**}**

**FIND THE OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int i,j,k;**

**clrscr();**

**i=1;**

**j=12;**

**k=13;**

**i= j == k;**

**printf("%d",i); //0**

**getch();**

**}**

**FIND THE OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int i,j;**

**clrscr();**

**i=10;**

**j=++i;**

**printf("%d",j); //11**

**getch();**

**}**

**FIND THE OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**unsigned int i=-1;**

**unsigned int j;**

**clrscr();**

**printf("%u",++i); //0**

**printf("%u",j=-i); //0**

**getch();**

**}**

**FIND THE OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int i;**

**clrscr();**

**i=5;**

**printf("%d",i=++i==6); //1**

**getch();**

**}**

**IF CONDITION**

**PROGRAM TO FIND LARGEST AMONG THREE NUMBERS.**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int a,b,c;**

**clrscr();**

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

**printf("ENTER b "); scanf("%d",&b);**

**printf("ENTER c "); scanf("%d",&c);**

**if(a>b && a>c) { printf("%d",a); }**

**if(b>a && b>c) { printf("%d",b); }**

**if(c>a && c>b) { printf("%d",c); }**

**if(a==b && a==c)**

**{**

**printf("A = %d, B = %d, C = %d ARE EQUAL",a,b,c);**

**}**

**getch();**

**}**

**MENU DRIVEN PROGRAM ON TEMPERATURE CONVERSION. (CHARACTER CHOICE)**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**float frn,clc;**

**char value;**

**clrscr();**

**printf("YOUR CHOICE ");**

**printf("\nA = FOR FARAN TO CELCIUS");**

**printf("\nB = FOR CELCIUS TO FARAN\n");**

**scanf("%c",&value);**

**if(value=='B')**

**{**

**printf("CELCIUS TEMP ");**

**scanf("%f",&clc);**

**frn=(clc-32)/1.8;**

**printf("FARAN TEMP %f",frn);**

**}**

**else if(value=='A')**

**{**

**printf("FARAN TEMP ");**

**scanf("%f",&frn);**

**clc=1.8\*frn + 32;**

**printf("CELCIUS TEMP %f",clc);**

**}**

**else**

**{**

**printf("WRONG CHOICE");**

**}**

**getch();**

**}**

**PROGRAM TO CALCULATE GRADE**

**A GRADE IF MARKS ARE FROM 90 TO 100**

**B GRADE IF MARKS ARE FROM 75 TO 89**

**C GRADE IF MARKS ARE FROM 60 TO 74**

**D GRADE IF MARKS ARE FROM 40 TO 59**

**ELSE F GRADE**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**char ch;**

**float eng,maths,comp,che,phy,tot,av;**

**clrscr();**

**printf("ENTER ENGLISH MARKS "); scanf("%f",&eng);**

**printf("ENTER MATHS MARKS "); scanf("%f",&maths);**

**printf("ENTER COMPUTER MARKS "); scanf("%f",&comp);**

**printf("ENTER CHEMISTRY MARKS "); scanf("%f",&che);**

**printf("ENTER PHYSICS MARKS "); scanf("%f",&phy);**

**tot=eng+maths+comp+che+phy;**

**av=tot/5;**

**if(av>=90 && av<=100)**

**{**

**ch='A';**

**}**

**else if(av>=60 && av<=74)**

**{**

**ch='C';**

**}**

**else if(av>=75 && av<=89)**

**{**

**ch='B';**

**}**

**else if(av>=40 && av<=59)**

**{**

**ch='D';**

**}**

**else**

**{**

**ch='F';**

**}**

**printf("\n%f %f %c",tot,av,ch);**

**getch();**

**}**

**PROGRAM ON QUADRATIC EQUATION.**

**#include<stdio.h>**

**#include<conio.h>**

**#include<math.h>**

**void main()**

**{**

**int a,b,c;**

**float D;**

**float R1,R2;**

**clrscr();**

**printf("ENTER A "); scanf("%d",&a);**

**printf("ENTER B "); scanf("%d",&b);**

**printf("ENTER C "); scanf("%d",&c);**

**D=(b\*b)-(4\*a\*c);**

**if(D>0)**

**{**

**R1=(-b + sqrt(D))/2\*a;**

**R2=(-b - sqrt(D))/2\*a;**

**printf("ROOTS ARE REAL\n");**

**printf("ROOT 1 %f\n",R1);**

**printf("ROOT 2 %f\n",R2);**

**}**

**else if(D==0)**

**{**

**R1=(-b)/2\*a;**

**R2=(-b)/2\*a;**

**printf("ROOTS ARE REAL AND EQUAL\n");**

**printf("ROOT 1 %f\n",R1);**

**printf("ROOT 2 %f\n",R2);**

**}**

**else**

**{**

**printf("ROOTS ARE COMPLEX AND IMAGINARY\n");**

**}**

**getch();**

**}**

**CONCEPT OF CHANGING THE CASE OF A CHARACTER.**

**#include<string.h>**

**#include<conio.h>**

**void main()**

**{**

**char ch;**

**clrscr();**

**printf("ENTER A CHARACTER "); scanf(" %c",&ch);**

**if(ch>='A' && ch<='Z')**

**{**

**ch=ch+32;**

**printf("THE CHANGED CASE CHARACTER IS %c",ch);**

**}**

**else if(ch>='a' && ch<='z')**

**{**

**ch=ch-32;**

**printf("THE CHANGED CASE CHARACTER IS %c",ch);**

**}**

**getch();**

**}**

**SWITCH CASE.**

**DESIGN A CALCULATOR USING SWITCH CASE.**

**#include<stdio.h>**

**#include<conio.h>**

**#include<process.h>**

**void main()**

**{**

**int n;**

**float num1,num2,ans;**

**clrscr();**

**printf("ENTER CHOICE FOR CALCULATOR \n");**

**printf("1 FOR +\n");**

**printf("2 FOR -\n");**

**printf("3 FOR \*\n");**

**printf("4 FOR /\n");**

**printf("5 FOR %\n");**

**scanf("%d",&n);**

**printf("NOW ENTER FIRST NUMBER ");**

**scanf("%f",&num1);**

**printf("NOW ENTER SECOND NUMBER ");**

**scanf("%f",&num2);**

**switch(n)**

**{**

**case 1: ans=num1+num2;**

**break;**

**case 2: ans=num1-num2;**

**break;**

**case 3: ans=num1\*num2;**

**break;**

**case 4: ans=num1/num2;**

**break;**

**case 5: ans=(int)num1%(int)num2;**

**break;**

**default: printf("WRONG CHOICE");**

**exit(0);**

**}**

**printf("ANSWER IS %f",ans);**

**getch();**

**}**

**PROGRAM ON ELSE IF TO TELL DAY.**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int day;**

**clrscr();**

**printf("ENTER A DAY NUMBER ");**

**scanf("%d",&day);**

**if(day==1)**

**{ printf("MONDAY\n"); }**

**else if(day==2)**

**{ printf("TUESDAY\n"); }**

**else if(day==3)**

**{ printf("WEDNESDAY\n"); }**

**else if(day==4)**

**{ printf("THRUSDAY\n"); }**

**else if(day==5)**

**{ printf("FRIDAY\n"); }**

**else if(day==6)**

**{ printf("SATURDAY\n"); }**

**else if(day==7)**

**{ printf("SUNDAY\n"); }**

**else**

**{ printf("WRONG DAY\n"); }**

**getch();**

**}**

**PROGRAM ON SWITCH CASE TO TELL DAY.**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int day;**

**clrscr();**

**printf("ENTER A DAY NUMBER ");**

**scanf("%d",&day);**

**switch(day)**

**{**

**case 1:printf("MONDAY\n"); break;**

**case 2:printf("TUESDAY\n"); break;**

**case 3:printf("WEDNESDAY\n"); break;**

**case 4:printf("THRUSDAY\n"); break;**

**case 5:printf("FRIDAY\n"); break;**

**case 6:printf("SATURDAY\n"); break;**

**case 7:printf("SUNDAY\n"); break;**

**default:printf("WRONG DAY\n");**

**}**

**getch();**

**}**

**PROGRAM TO CALCULATE ELECTRICITY BILL.**

**100 UNITS - 3**

**101-150 UNITS - 5**

**151-200 UNITS - 6**

**METER RENT - 500**

**#include<conio.h>**

**#include<stdio.h>**

**void main()**

**{**

**int units,runits;**

**int rs,price;**

**clrscr();**

**rs=0;**

**printf("ENTER ELECTRICITY UNITS ");**

**scanf("%d",&units);**

**if(units>=151 && units<=200)**

**{**

**runits=units-150;**

**price=runits \* 6;**

**rs=rs+price;**

**}**

**if(units>=101 && units<=150)**

**{**

**runits=units-100;**

**price=runits \* 5;**

**rs=rs+price;**

**}**

**if(units>=0 && units<=100)**

**{**

**price=units \* 3;**

**rs=rs+price;**

**}**

**rs=rs+500;**

**printf("THE TOTAL BILL IS %d",rs);**

**getch();**

**}**

**PROGRAM WHICH DETECTS FOR A FLOATING POINT INPUT.**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**float years;**

**int check;**

**float secs;**

**clrscr();**

**printf("INPUT YOUR AGE IN YEARS ");**

**check=scanf("%f",&years);**

**if(check==0)**

**{**

**printf("THE DATA ENTERED IS NOT FLOATING POINT\n");**

**}**

**if(check!=0)**

**{**

**secs=years\*365\*24\*60\*60;**

**printf("YOU HAVE LIVED FOR %f SECONDS\n",secs);**

**}**

**getch();**

**}**

**PROGRAM WHICH DISPLAYS HELLO! GTBIT ON SCREEN WITHOUT USING SEMICOLON.**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**if(printf("HELLO! GTBIT")) { }**

**}**

**PROGRAM TO FIND THE LEAP YEAR.**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int year;**

**clrscr();**

**printf("ENTER YEAR ");**

**scanf("%d",&year);**

**if((year%4==0 && year%100!=0) || (year%100==0))**

**{ printf("LEAP YEAR"); }**

**else**

**{ printf("NOT LEAP YEAR"); }**

**getch();**

**}**

**LOOPS**

**PROGRAM TO DISPLAY THE SUM OF EVEN NUMBERS (IF USED WITHIN FOR LOOP).**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int i,S=0;**

**clrscr();**

**for(i=1;i<=100;i++)**

**{**

 **if(i%2==0)**

 **{**

 **S=S+i;**

 **}**

**}**

**printf("EVEN NUMBER SUM IS %d",S);**

**getch();**

**}**

**PROGRAM TO PRINT FIBONACCI SERIES:**

**0 1 1 2 3 5 8 13**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int a,b,c,i;**

**clrscr();**

**a=0;**

**b=1;**

**printf("\nFIBONACCI SERIES IS \n\n");**

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

**for(i=3;i<=8;i++)**

**{**

 **c=a+b;**

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

 **a=b;**

 **b=c;**

**}**

**getch();**

**}**

**PROGRAM TO CHECK FOR PRIME NUMBER.**

**#include<stdio.h>**

**#include<conio.h>**

**#include<process.h>**

**void main()**

**{**

**int num,i;**

**clrscr();**

**printf("\nENTER A NUMBER TO BE CHECKED FOR PRIME NUMBER\n");**

**scanf("%d",&num);**

**for(i=2;i<=num-1;i++)**

**{**

 **if(num % i==0)**

 **{**

 **printf("\nIT IS NOT PRIME\n");**

 **getch();**

 **exit(0);**

 **}**

**}**

**printf("\nNUMBER IS PRIME\n");**

**getch();**

**}**

**FIND THE OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int i,v,s=0;**

**clrscr();**

**for(i=1;i<=5;i++)**

**{**

**v=i\*3;**

**s=s+v;**

**}**

**printf("SUM IS %d",v);**

**getch();**

**}**

**FIND THE OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int x=0;**

**clrscr();**

**for(;;)**

**{**

 **if(x++ == 4) break;**

 **else continue;**

**}**

**printf("\n X = %07d",x);**

**getch();**

**}**

**OUTPUT:**

**X = 0000005**

**FIND THE OUTPUT:**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int i,j;**

**clrscr();**

**if(-1) {**

 **for(i=1;i<=3;i++)**

 **{**

 **for(j=1;j<=3;j++)**

 **{**

 **if(i==j) continue;**

 **if((j%3) > 1) break;**

 **printf("%d\n",i);**

 **}**

 **} }**

**printf("\nNOT CORRECT");**

**getch();**

**}**

**OUTPUT:**

**2**

**2**

**3**

**NOT CORRECT**

**PROGRAM TO PRINT SUM OF NUMBERS ON THE SCREEN USING WHILE LOOP.**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int i,n,sum=0;**

**clrscr();**

**printf("ENTER THE LENGTH OF THE LOOP ");**

**scanf("%d",&n);**

**i=1;**

**while(i<=n)**

**{**

**printf("%d\n",i);**

**sum=sum+i;**

**i++;**

**}**

**printf("THE SUM IS %d\n",sum);**

**getch();**

**}**

**PROGRAM TO PRINT FACTORIAL ON THE SCREEN USING WHILE LOOP.**

**#include<stdio.h>**

**#include<conio.h>**

**void main()**

**{**

**int i,n;**

**long int f=1;**

**clrscr();**

**printf("ENTER THE NUMBER FOR FACTORIAL ");**

**scanf("%d",&n);**

**i=1;**

**while(i<=n)**

**{**

**f=f\*i;**

**i++;**

**}**

**printf("\nTHE FACTORIAL OF %d IS %ld",n,f);**

**getch();**

**}**

**ARRAYS AND FUNCTIONS**

**PROGRAM FOR BINARY SEARCH (ASCENDING ORDER ARRAY).**

**#include<stdio.h>**

**#include<conio.h>**

**int BINARY\_SEARCH(int arr[],int len,int item)**

**{**

**int top,bottom,mid;**

**top=0;**

**bottom=len-1;**

**mid=(top+bottom)/2;**

**do**

**{**

 **if(arr[mid]<item)**

 **{**

 **top=mid+1;**

 **mid=(top+bottom)/2;**

 **}**

 **else if(arr[mid]==item)**

 **{**

 **return (mid);**

 **break;**

 **}**

 **else if(arr[mid]>item)**

 **{**

 **bottom=mid-1;**

 **mid=(top+bottom)/2;**

 **}**

**}while(top<=bottom);**

**if(top>bottom)**

**{**

 **return (-1);**

**}**

**}**

**void main()**

**{**

**int a[10],ele,n,i,pos;**

**clrscr();**

**printf("\nENTER THE TOTAL ELEMENTS "); scanf("%d",&n);**

**printf("ENTER ARRAY ");**

**for(i=0;i<n;i++) { scanf("%d",&a[i]); }**

**printf("ENTER THE ELEMENT YOU WANT TO SEARCH "); scanf("%d",&ele);**

**pos=BINARY\_SEARCH(a,n,ele);**

**if(pos!=-1)**

**{**

**printf("POSITION %d",pos);**

**}**

**else**

**{**

**printf("ELEMENT NOT PRESENT");**

**}**

**getch();**

**}**

**PROGRAM FOR INSERTION INTO AN ARRAY AT A SPECIFIC POSITION**

**FUNCTION SHOULD RECEIVE ARRAY, SIZE OF ARRAY, NEW ELEMENT AND POSITION OF NEW ELEMENT TO BE INSERTED.**

**#include<stdio.h>**

**#include<conio.h>**

**#include<process.h>**

**void ARRAY\_INSERTION(int a[], int len, int pos, int ele)**

**{**

**int i;**

**for(i=len;i>pos;i--)**

**{**

 **a[i]=a[i-1];**

**}**

**a[pos]=ele;**

**len=len+1;**

**printf("\nDISPLAYING FINAL ARRAY ");**

**for(i=0;i<len;i++)**

**{**

 **printf("%d ",a[i]);**

**}**

**}**

**void main()**

**{**

**int arr[100];**

**int n,i;**

**int item;**

**int p;**

**clrscr();**

**printf("\nENTER THE TOTAL ELEMENTS ");**

**scanf("%d",&n);**

**printf("ENTER ARRAY ");**

**for(i=0;i<n;i++)**

**{**

**scanf("%d",&arr[i]);**

**}**

**printf("\nENTER THE ELEMENT TO BE INSERTED ");**

**scanf("%d",&item);**

**printf("\nENTER THE POSITION OF ELEMENT TO BE INSERTED ");**

**scanf("%d",&p);**

**if(p>n)**

**{**

**printf("\nABORTING ! POSITION OF INSERTION IS GREATER THAN ARRAY SIZE");**

**getch();**

**exit(0);**

**}**

**ARRAY\_INSERTION(arr, n, p, item);**

**getch();**

**}**

**PROGRAM FOR INSERTION INTO AN ARRAY (IN ASCENDING ORDER) AT A SPECIFIC POSITION FUNCTION SHOULD RECEIVE ARRAY, SIZE OF ARRAY, NEW ELEMENT.**

**#include<stdio.h>**

**#include<conio.h>**

**void ARRAY\_INSERTION(int a[], int len, int ele)**

**{**

**int i,pos;**

**for(i=0;i<len;i++)**

**{**

 **if(a[i]<=ele && a[i+1]>=ele)**

 **{**

 **pos=i+1;**

 **}**

**}**

**for(i=len;i>pos;i--)**

**{**

 **a[i]=a[i-1];**

**}**

**a[pos]=ele;**

**len=len+1;**

**printf("\nDISPLAYING FINAL ARRAY ");**

**for(i=0;i<len;i++)**

**{**

 **printf("%d ",a[i]);**

**}**

**}**

**void main()**

**{**

**int arr[100];**

**int n,i;**

**int item;**

**int p;**

**clrscr();**

**printf("\Nenter SIZE OF ORIGINAL ARRAY "); scanf("%d",&n);**

**printf("\nENTER THE ELEMENTS OF ARRAY ");**

**for(i=0;i<n;i++) { scanf("%d",&arr[i]); }**

**printf("\nENTER THE ELEMENT TO BE INSERTED "); scanf("%d",&item);**

**ARRAY\_INSERTION(arr, n, item);**

**getch();**

**}**

**PROGRAM FOR DELETION OF AN ELEMENT FROM AN ARRAY. FUNCTION SHOULD RECEIVE ARRAY, SIZE OF ARRAY, POSITION.**

**#include<stdio.h>**

**#include<conio.h>**

**#include<process.h>**

**void ARRAY\_DELETION(int a[], int len, int pos)**

**{**

**int i;**

**for(i=pos;i<len;i++)**

**{**

 **a[i]=a[i+1];**

**}**

**len=len-1;**

**printf("\nDISPLAYING FINAL ARRAY ");**

**for(i=0;i<len;i++)**

**{**

 **printf("%d ",a[i]);**

**}**

**}**

**void main()**

**{**

**int arr[100];**

**int n,i;**

**int item;**

**int p;**

**clrscr();**

**printf("\nENTER THE SIZE OF ORIGINAL ARRAY ");**

**scanf("%d",&n);**

**printf("\nENTER THE ELEMENTS OF ARRAY ");**

**for(i=0;i<n;i++) { scanf("%d",&arr[i]); }**

**printf("\nENTER THE ELEMENT TO BE DELETED "); scanf("%d",&item);**

**for(i=0;i<n;i++) {**

 **if(arr[i]==item)**

 **{**

 **p=i;**

 **break;**

 **} }**

**if(i==n) {**

**printf("\nABORTING ! POSITION OF ELEMENT NOT FOUND");**

**getch();**

**exit(0); }**

**ARRAY\_DELETION(arr, n, p);**

**getch(); }**

**PROGRAM TO SORT AN ARRAY USING SELECTION SORT.**

**#include<stdio.h>**

**#include<conio.h>**

**void SELECTION\_SORT(int a[], int len)**

**{**

**int j,i;**

**int smallest,pos,start,temp;**

**for(i=0;i<len;i++)**

**{**

**start=i; S1**

**smallest=a[start]; S2**

**pos=start; S3**

 **for(j=start;j<len;j++) S4**

 **{**

 **if(smallest > a[j]) S5**

 **{**

 **smallest=a[j]; S6**

 **pos=j; S7**

 **}**

 **}**

**temp=a[i]; S8**

**a[i]=a[pos]; S9**

**a[pos]=temp; S10**

**}**

**printf("\nDISPLAYING SORTED ARRAY ");**

**for(i=0;i<len;i++)**

**{**

 **printf("%d ",a[i]);**

**}**

**}**

**void main()**

**{**

**int arr[10],n,i;**

**clrscr();**

**printf("\nENTER THE TOTAL ELEMENTS ");**

**scanf("%d",&n);**

**printf("\nENTER ARRAY ");**

**for(i=0;i<n;i++)**

**{**

**scanf("%d",&arr[i]);**

**}**

**SELECTION\_SORT(arr, n);**

**getch();**

**}**

**PROGRAM FOR INSERTION SORT**

**#include<stdio.h>**

**#include<conio.h>**

**void insort(int a[],int n)**

**{**

**int i,j,temp;**

**for(i=1;i<n;i++) S1**

**{**

**temp=a[i]; S2**

**j=i-1; S3**

**while(temp<a[j] && j>=0) S4**

**{**

**a[j+1]=a[j]; S5**

**j=j-1; S6**

**}**

**a[j+1]=temp; S7**

**}**

**printf("\n\nSORTED ARRAY \n");**

**for(i=0;i<n;i++)**

**{**

**printf("DATA ELEMENTS [ %d ] %d\n",i,a[i]);**

**}**

**}**

**void main()**

**{**

**int ar[10],n1,i;**

**clrscr();**

**printf("PROGRAM FOR INSERTION SORT");**

**getch();**

**clrscr();**

**printf("ENTER ARRAY SIZE ");**

**scanf("%d",&n1);**

**for(i=0;i<n1;i++)**

**{**

**printf("DATA ELEMENTS [ i ] ",i);**

**scanf("%d",&ar[i]);**

**}**

**insort(ar,n1);**

**getch();**

**}**