

1. Write C program to accept the details of employee and display them using structure. Details consist of Employee ID, Name, Designation, Department, and Salary.

C:\Users\hp\Documents\displaying employee details.cpp - [Executing] - Dev-C++ 5.11

File Edit Search View Project Execute Tools AStyle Window Help

TDM-GCC 4.9.2 64-bit Release

(globals)

Project Classes Debug

displaying employee details.cpp

```
1  #include<stdio.h>
2  struct employee
3  {
4      int e;
5      char name[20];
6      char designation[20];
7      char dept[20];
8      int sal;
9  };
10 int main()
11 {
12     struct employee a;
13     printf("Enter Employee Details:\n");
14     printf("-----\n");
15     printf("Enter Employee-Id : ");
16     scanf("%d",&a.e);
17     printf("Enter Name      : ");
18     scanf("%s",a.name);
19     printf("Enter Designation : ");
20     scanf("%s",a.designation);
21     printf("Enter Department : ");
22     scanf("%s",a.dept);
23     printf("Enter Salary      : ");
24     scanf("%d",&a.sal);
25     printf("-----");
26     printf("\nEmployee Details: \n-----\n");
```

Compiler Resources Compile Log Debug Find Results Close

About Compilation

☐ Shorten compiler paths

- Command: g++.exe "C:\Users\hp\Documents\displaying employee details.cpp" -o "C:\Users\hp\Documents\displaying employee details.exe" -I"C:\Progra

Compilation results...

- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\displaying employee details.exe
- Output Size: 128.8017578125 KiB

C:\Users\hp\Documents\displaying employee details.cpp - [executing] - Dev-C++ 5.11

File Edit Search View Project Execute Tools AStyle Window Help



TDM-GCC 4.9.2 64-bit Release

(globals)

Project Classes Debug displaying employee details.cpp

```
8 | int sal;
9 | };
10 | int main()
11 | {
12 |     struct employee a;
13 |     printf("Enter Employee Details:\n");
14 |     printf("-----\n");
15 |     printf("Enter Employee-Id : ");
16 |     scanf("%d",&a.e);
17 |     printf("Enter Name      : ");
18 |     scanf("%s",a.name);
19 |     printf("Enter Designation : ");
20 |     scanf("%s",a.designation);
21 |     printf("Enter Department : ");
22 |     scanf("%s",a.dept);
23 |     printf("Enter Salary      : ");
24 |     scanf("%d",&a.sal);
25 |     printf("-----");
26 |     printf("\nEmployee Details: \n-----\n");
27 |     printf("Employee-Id : %d\n",a.e);
28 |     printf("Name       : %s\n",a.name);
29 |     printf("Designation : %s\n",a.designation);
30 |     printf("Department  : %s\n",a.dept);
31 |     printf("Salary      : %d\n",a.sal);
32 |     return 0;
33 | }
```

Compiler Resources Compile Log Debug Find Results Close

Command: g++.exe "C:\Users\hp\Documents\displaying employee details.cpp" -o "C:\Users\hp\Documents\displaying employee details.exe" -I"C:\Pro

Compilation results...

- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\displaying employee details.exe
- Output Size: 128.8017578125 KiB

25 Col: 48 Sel: 0 Lines: 33 Length: 961 Insert Done parsing in 0.25 seconds

Type here to search



31°C Mostly cloudy 19:12 07-04-2023

Enter Employee Details:

Enter Employee-Id : 276
Enter Name : parth
Enter Designation : manager
Enter Department : production
Enter Salary : 30000

Employee Details:

Employee-Id : 276
Name : parth
Designation : manager
Department : production
Salary : 30000

Process exited after 32.04 seconds with return value 0
Press any key to continue . . .

2. Write C program to accept batting information of cricket team using structure. It contains player name and runs scored by player. Calculate total runs scored by cricket team.

```
1  #include<stdio.h>
2  struct player
3  {
4      char name[20];
5      int runs;
6  };
7  int main()
8  {
9      int i,s=0;
10     struct player a[11]; //a[11] - no. of players
11     printf("Enter Name of Player Runs Scored \n");
12     printf("-----\n\t");
13     for(i=0;i<=10;i++)
14     {
15         scanf("%s",a[i].name);
16         scanf("%d",&a[i].runs);
17         printf("\t");
18     }
19     for(i=0;i<=10;i++)
20         s=s+a[i].runs;
21     printf("\n-----\n");
22     printf("Total Runs Scored by Team: %d",s);
23     return 0;
24 }
```

Compilation results...

```
-----
- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\total runs scored by cricket team.exe
- Output Size: 129.4794921875 KiB
- Compilation Time: 0.56s
```


Player Name of Player Runs Scored

virat 50
dhoni 30
yuvraj 30
rohit 40
ashwin 25
raina 36
gautam 20
jadeja 10
dhawan 49
rahane 23
rahul 15

Total Runs Scored by Team: 328

Process exited after 138.7 seconds with return value 0
Press any key to continue . . .

3. C program to read information of student. It contains Name, Roll number, Birthday, admission date. Calculate age of student at the time of admission.

```

1  #include<stdio.h>
2  struct student
3  {
4      int roll_num;
5      char name[20];
6      struct Date
7      {
8          int D;
9          int M;
10         int Y;
11     } bd, ad;
12 };
13 int main()
14 {
15     int r;
16     struct student a;
17     printf("\nEnter Student Details\n");
18     printf("-----\n");
19     printf("Enter Roll-Number : ");
20     scanf("%d",&a.roll_num);
21     printf("Enter Name : ");
22     scanf("%s",a.name);
23     printf("Enter Birth-Date : ");
24     scanf("%d-%d-%d",&a.bd.D,&a.bd.M,&a.bd.Y);
25     printf("Enter Admission-Date : ");
26     scanf("%d-%d-%d",&a.ad.D,&a.ad.M,&a.ad.Y);

```

Compilation results...

```

- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\calculate the age of student at admission time.exe
- Output Size: 128.8203125 KiB
- Compilation Time: 0.59s

```

C:\Users\hp\Documents\calculate the age of student at admission time.cpp - [Executing] - Dev-C++ 5.11

File Edit Search View Project Execute Tools AStyle Window Help

TDM-GCC 4.9.2 64-bit Release

(globals)

Project Classes Debug displaying employee details.cpp total runs scored by cricket team.cpp calculate the age of student at admission time.cpp

```
11 | }bd,ad;
12 | };
13 | int main()
14 | {
15 |     int r;
16 |     struct student a;
17 |     printf("\nEnter Student Details\n");
18 |     printf("-----\n");
19 |     printf("Enter Roll-Number : ");
20 |     scanf("%d",&a.roll_num);
21 |     printf("Enter Name : ");
22 |     scanf("%s",a.name);
23 |     printf("Enter Birth-Date : ");
24 |     scanf("%d-%d-%d",&a.bd.D,&a.bd.M,&a.bd.Y);
25 |     printf("Enter Admission-Date : ");
26 |     scanf("%d-%d-%d",&a.ad.D,&a.ad.M,&a.ad.Y);
27 |     r=a.ad.Y-a.bd.Y;
28 |     printf("-----\n");
29 |     printf("\nApproximate Age of Student at the Time of Admission\n");
30 |     printf("-----\n");
31 |     printf("\t%d Years",r);
32 |     return 0;
33 | }
34 |
35 |
36 |
```

Compiler Resources Compile Log Debug Find Results Close

About Compilation

Shorten compiler paths

Compilation results...

```
- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\calculate the age of student at admission time.exe
- Output Size: 128.8203125 KiB
- Compilation Time: 0.59s
```

RECEIVED: 11 FEBRUARY 2004; REVISED: 10 JUNE 2004; ACCEPTED: 10 JUNE 2004

```
-----
Roll-Number      : 9
Name             : bobby
Birth-Date       : 28-10-2004
Admission-Date   : 22-08-2022
-----
```

Approximate Age of Student at the Time of Admission

18 Years

```

Process exited after 33.15 seconds with return value 0
Press any key to continue . . .

```

4. Write a 'C' program to accept customer details such as: Account_no, Name, Balance using structure. Assume 3 customers in the bank. Write a function to print the account no. and name of each customer whose balance < 100 Rs.

C:\Users\hp\Documents\customer details 3.cpp - [Executing] - Dev-C++ 5.11

File Edit Search View Project Execute Tools AStyle Window Help

TDM-GCC 4.9.2 64-bit Release

(globals)

Project Classes Debug displaying employee details.cpp total runs scored by cricket team.cpp calculate the age of student at admission time.cpp customer details.cpp customer details 3.cpp

```
1  #include<stdio.h>
2  #include<conio.h>
3  int main()
4  {
5      struct bank
6      {
7          int acc_no;
8          char name[20];
9          int bal;
10         }b[5];
11
12         int i;
13         for(i=0;i<5;i++)
14         {
15             printf(" \n\n enter the acc_no,name,balance\n\n");
16             printf("\nenter the account no\n");
17             scanf("%d",&b[i].acc_no);
18             printf("\n enter the name\n");
19             scanf("%s",b[i].name);
20             printf("\n enter the balance\n");
21             scanf("%d",&b[i].bal);
22         }
23         for(i=0;i<5;i++)
24         {
25             if(b[i].bal<100)
26             {
```

Compiler Resources Compile Log Debug Find Results Close

Compilation results...

- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\customer details 3.exe
- Output Size: 129.962890625 KiB
- Compilation Time: 0.64s

Shorten compiler paths

File Edit Search View Project Execute Tools AStyle Window Help

Debugger toolbar icons: Run, Step Over, Step Into, Step Out, Breakpoint, Watch, Call Stack, etc.

Toolchain: TDM-GCC 4.9.2 64-bit Release

Globals dropdown menu

Project Explorer: displaying employee details.cpp | total runs scored by cricket team.cpp | calculate the age of student at admission time.cpp | customer details.cpp | customer details 3.cpp

```
10 }b[5];
11
12 int i;
13 for(i=0;i<5;i++)
14 {
15     printf(" \n\n enter the acc_no,name,balance\n\n");
16     printf("\nenter the account no\n");
17     scanf("%d",&b[i].acc_no);
18     printf("\n enter the name\n");
19     scanf("%s",b[i].name);
20     printf("\n enter the balance\n");
21     scanf("%d",&b[i].bal);
22 }
23 for(i=0;i<5;i++)
24 {
25     if(b[i].bal<100)
26     {
27         printf("\n-----\n");
28         printf("\n\n The acc_no,name,balance below RS:-100\n\n");
29         printf("\n the account no:-%d\n",b[i].acc_no);
30         printf("\n the name:-%s\n",b[i].name);
31         printf("\n the balance:-%d\n",b[i].bal);
32     }
33 }
34 getch();
35 }
```

Compiler Resources Compile Log Debug Find Results Close

Abort Compilation

Shorten compiler paths

Compilation results...

```
-----
- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\customer details 3.exe
- Output Size: 129.962890625 KiB
- Compilation Time: 0.64s
```



Enter Details of Customer 1

Enter Account Number : 1109
Enter Name : Roshan
Enter Balance : 89

Enter Details of Customer 2

Enter Account Number : 3012
Enter Name : Prajakta
Enter Balance : 550

Enter Details of Customer 3

Enter Account Number : 59198
Enter Name : Sapna
Enter Balance : 78

Customer Details whose Balance < 100 Rs.

Account Number : 1109
Name : Roshan
Balance : 89

Account Number : 59198
Name : Sapna
Balance : 78

5. Write a C program to accept details of 'n' employee (eno, ename, salary) and display the details of employee having highest salary. Use array of structure.

File Edit Search View Project Execute Tools AStyle Window Help



TDM-GCC 4.9.2 64-bit Release

(globals)

Project Classes Debug displaying employee details.cpp total runs scored by cricket team.cpp calculate the age of student at admission time.cpp customer details.cpp customer details 3.cpp to accept the details of n employee.cpp

```
1  #include<stdio.h>
2  struct employee
3  {
4      int eno;
5      char ename[20];
6      int salary;
7  }emp[10];
8  int main()
9  {
10     int i,high,n;
11     printf("/How many employee info\you want to accept : ");
12     printf("Enter Limit: ");
13     scanf("%d",&n);
14     printf("-----\n");
15     printf("Enter details for %d employees:",n);
16     printf("\n-----\n");
17     for(i=0;i<n;i++)
18     {
19         printf("Employee Number: ");
20         scanf("%d",&emp[i].eno);
21         printf("Name      : ");
22         scanf("%s",emp[i].ename);
23         printf("Salary      : ");
24         scanf("\n %d",&emp[i].salary);
25         printf("-----\n");
26     }
```

Compiler Resources Compile Log Debug Find Results Close

Abort Compilation

Shorten compiler paths

Compilation results...

```
- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\to accept the details of n employee.exe
- Output Size: 129.3271484375 KiB
- Compilation Time: 0.55s
```

C:\Users\hp\Documents\to accept the details of n employee.cpp - [Executing] - Dev-C++ 5.11

File Edit Search View Project Execute Tools AStyle Window Help

TDM-GCC 4.9.2 64-bit Release

(globals)

Project Classes Debug displaying employee details.cpp total runs scored by cricket team.cpp calculate the age of student at admission time.cpp customer details.cpp customer details 3.cpp to accept the details of n employee.cpp

```
17 for(i=0;i<n;i++)
18 {
19     printf("Employee Number: ");
20     scanf("%d",&emp[i].eno);
21     printf("Name      : ");
22     scanf("%s",emp[i].ename);
23     printf("Salary      : ");
24     scanf("%d",&emp[i].salary);
25     printf("-----\n");
26 }
27 high=emp[0].salary;
28 for(i=0;i<n;i++)
29 {
30     if(emp[i].salary>high)
31         high=emp[i].salary;
32 }
33 printf("Highest salary employee details:");
34 printf("\n-----\n");
35 printf("EMPNO    NAME    SALARY\n");
36 for(i=0;i<n;i++)
37 {
38     if(emp[i].salary==high)
39         printf("\n %d\t%s\t%d",emp[i].eno,emp[i].ename,emp[i].salary);
40 }
41 return 0;
42 }
```

Compiler Resources Compile Log Debug Find Results Close

Compilation results...

- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\to accept the details of n employee.exe
- Output Size: 129.3271484375 KiB
- Compilation Time: 0.55s

<

About Compilation

☐ Shorten compiler paths

u want to accept : Enter Limit: 3

ter details for 3 employees:

ployee Number: 101
me : sai
lary : 36000

ployee Number: 102
me : bobby
lary : 32000

ployee Number: 103
me : sri
lary : 42000

ghest salary employee details:

PNO	NAME	SALARY
-----	------	--------

03	sri	42000
----	-----	-------

rocess exited after 61.31 seconds with return value 0
ess any key to continue . . .

6. Write a menu driven program in 'C' which shows the working of library.

The menu option should be

- i) Add book details.
- ii) Display book details.
- iii) List all books of given author.
- iv) List the count of books in the library.
- v) Exit.



TDM-GCC 4.9.2 64-bit Release

(globals)

Project Classes Debug

displaying employee details.cpp

total runs scored by cricket team.cpp

calculate the age of student at admission time.cpp

customer details.cpp

customer details 3.cpp

to accept the details of n employee.cpp

menu driven program of library in c.cpp

```
1 #include<stdio.h>
2 #include<stdlib.h>
3 #include<string.h>
4 struct book
5 {
6     int b_no;
7     char b_name[40];
8     char b_author[40];
9     int no_pages;
10 };
11 int main()
12 {
13     struct book b[20];
14     int ch,n,i,count = 0;
15     char temp[40];
16     do
17     {
18         printf("\t\tMENU");
19         printf("\n-----\n");
20         printf("PRESS 1.TO ADD BOOK DETAILS.");
21         printf("\nPRESS 2.TO DISPLAY BOOK DETAILS.");
22         printf("\nPRESS 3.TO DISPLAY BOOK OF GIVEN AUTHOR.");
23         printf("\nPRESS 4.TO COUNT NUMBER OF BOOKS.");
24         printf("\nPRESS 5.TO EXIT.");
25         printf("\n-----\n");
```

Compiler Resources Compile Log Debug Find Results Close

Abort Compilation

Compilation results...

```
- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\menu driven program of library in c.exe
- Output Size: 130.98046875 KiB
- Compilation Time: 0.58s
```

Line 20 Col 22 Sel 0 Line 85 Length 2242 Insert Done saving in 0.203 seconds

C:\Users\hp\Documents\menu driven program of library in c.cpp - [Executing] - Dev-C++ 5.11

Edit Search View Project Execute Tools AStyle Window Help



(globals)

Project Classes Debug displaying employee details.cpp total runs scored by cricket team.cpp calculate the age of student at admission time.cpp customer details.cpp

customer details 3.cpp to accept the details of n employee.cpp menu driven program of library in c.cpp

```
62 | scanf("%s",temp);
63 | printf("-----");
64 | for( i = 0 ; i < n ; i++)
65 | {
66 |     if(strcmp(b[i].b_author,temp) == 0)
67 |     {
68 |         printf("\n%s\n",b[i].b_name);
69 |     }
70 | }
71 | break;
72 | case 4 :
73 |     for( i = 0 ; i < n ; i++)
74 |     {
75 |         count++;
76 |     }
77 |     printf("\nTotal Number of Books in Library : %d\n",count);
78 |     printf("-----\n");
79 |     break;
80 | case 5 :
81 |     exit(0);
82 | }
83 | }while(ch != 5);
84 | return 0;
85 | }
```

Compiler Resources Compile Log Debug Find Results Close

About Compilation

Compilation results...

- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\menu driven program of library in c.exe
- Output Size: 130.98046875 KiB
- Compilation Time: 0.58s

Shorten compiler paths

File Edit Search View Project Execute Tools AStyle Window Help



TDM-GCC 4.9.2 64-bit Release

(globals)

Project Classes Debug displaying employee details.cpp total runs scored by cricket team.cpp calculate the age of student at admission time.cpp customer details.cpp
customer details 3.cpp to accept the details of n employee.cpp menu driven program of library in c.cpp

```
53 | printf("\n-----");
54 | for( i = 0 ; i < n ; i++)
55 | {
56 |     printf("\n %d\t %s\t %s\t %d",b[i].b_no,b[i].b_name,b[i].b_author,b[i].no_pages);
57 | }
58 | printf("\n\n");
59 | break;
60 | case 3:
61 |     printf("\nEnter Author Name: ");
62 |     scanf("%s",temp);
63 |     printf("-----");
64 |     for( i = 0 ; i < n ; i++)
65 |     {
66 |         if(strcmp(b[i].b_author,temp) == 0)
67 |         {
68 |             printf("\n%s\n",b[i].b_name);
69 |         }
70 |     }
71 |     break;
72 | case 4 :
73 |     for( i = 0 ; i < n ; i++)
74 |     {
75 |         count++;
76 |     }
77 |     printf("\nTotal Number of Books in Library : %d\n",count);
```

Compiler Resources Compile Log Debug Find Results Close

Compilation results...

- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\menu driven program of library in c.exe
- Output Size: 130.98046875 KiB
- Compilation Time: 0.58s

Lines: 70 Col: 22 Sel: 0 Lines: 85 Length: 3343 Insert Done parsing in 0.203 seconds

Classes	Debug	displaying employee details.cpp	total runs scored by cricket team.cpp	calculate the age of student at admission time.cpp	customer details.cpp
		customer details 3.cpp	to accept the details of n employee.cpp		menu driven program of library in c.cpp

```

30 case 1:
31     printf("\nHow Many Records You Want to Add: ");
32     scanf("%d",&n);
33     printf("-----\n");
34     printf("Add Details of %d Book\n",n);
35     printf("-----\n");
36     for(i = 0 ; i < n ; i++)
37     {
38         printf("Enter Book No.      : ");
39         scanf("%d",&b[i].b_no);
40         printf("Book Name          : ");
41         scanf("%s",b[i].b_name);
42         printf("Enter Author Name : ");
43         scanf("%s",b[i].b_author);
44         printf("Enter No. of Pages : ");
45         scanf("%d",&b[i].no_pages);
46         printf("-----\n");
47     }
48     break;
49 case 2:
50     printf("\n\t\tDetails of All Book");
51     printf("\n-----\n");
52     printf("Book No.   Book Name\t Author Name\tNo. of Pages");
53     printf("\n-----");
54     for( i = 0 ; i < n ; i++)

```

☐ Compiler
 ☐ Resources
 ☒ Compile Log
 ☒ Debug
 ☐ Find Results
 ☐ Close

Post Compilation

Porten compiler paths

Compilation results...

```

-----
- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\menu driven program of library in c.exe
- Output Size: 130.98046875 KiB
- Compilation Time: 0.58s

```

MENU

PRESS 1.TO ADD BOOK DETAILS.
PRESS 2.TO DISPLAY BOOK DETAILS.
PRESS 3.TO DISPLAY BOOK OF GIVEN AUTHOR.
PRESS 4.TO COUNT NUMBER OF BOOKS.
PRESS 5.TO EXIT.

Enter Your Choice: 1

How Many Records You Want to Add: 2

Add Details of 2 Book

Enter Book No. : 1002
Book Name : C-Programming
Enter Author Name : Manas-Ghosh
Enter No. of Pages : 450

Enter Book No. : 1003
Book Name : Networking
Enter Author Name : Tanenbaum
Enter No. of Pages : 520

7. Write a 'C' Program to create a structure of student having fields roll_no, stud_name, mark1, mark2, mark3. Calculate total marks and average marks. Arrange the records in descending order of marks.

(globals)

Project

Classes

Debug

displaying employee details.cpp

total runs scored by cricket team.cpp

calculate the age of student at admission time.cpp

customer details.cpp

customer details 3.cpp

to accept the details of n employee.cpp

menu driven program of library in c.cpp

arranging student data in descending order.cpp

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```
#include<stdio.h>
struct student
{
    int rno;
    char name[20];
    int marks[3];
    int total;
    float avg;
}stud[2];
int main()
{
    int i,j;
    struct student s;
    for(i=0;i<2;i++)
    {
        printf("Enter Record for Student-%d \n",i+1);
        printf("-----\n");
        printf("Enter Roll-No. : ");
        scanf("%d",&stud[i].rno);
        printf("Enter Name : ");
        scanf("%s",stud[i].name);
        stud[i].total=0;
        for(j=0;j<3;j++)
        {
            printf("Enter Marks of Subject %d : ",j+1);
```

Compiler

Resources

Compile Log

Debug

Find Results

Close

About Compilation

Shorten compiler paths

Compilation results...

- Errors: 0

- Warnings: 0

- Output Filename: C:\Users\hp\Documents\arranging student data in descending order.exe

- Output Size: 129.833984375 KiB

- Compilation Time: 0.67s

ProjectClassesDebug

displaying employee details.cpptotal runs scored by cricket team.cppcalculate the age of student at admission time.cppcustomer details.cpp

customer details 3.cppto accept the details of n employee.cppmenu driven program of library in c.cpparranging student data in descending order.cpp

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```
        printf("Enter Marks of Subject %d : ",j+1);
        scanf("%d",&stud[i].marks[j]);
        stud[i].total=stud[i].total+stud[i].marks[j] ;
        stud[i].avg=stud[i].total/3.0;
    }
    printf("\n-----\n");
}
for(i=0;i<2;i++)
{
    for(j=i+1;j<2;j++)
    {
        if(stud[i].total<stud[j].total)
        {
            s=stud[i];
            stud[i]=stud[j];
            stud[j]=s;
        }
    }
}
printf("Records in Descending Order.\n (According to Total-Marks)");
printf("\n-----\n");
printf("\n ROLLNO    NAME    TOTAL-MARKS    AVG\n");
for(i=0;i<2;i++)
{
    printf("\n %d\t %s\t %d\t %.2f",stud[i].rno,stud[i].name,stud[i].total,stud[i].avg);
```

CompilerResourcesCompile LogDebugFind ResultsClose

About Compilation

☐ Shorten compiler paths

Compilation results...

- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\arranging student data in descending order.exe
- Output Size: 129.833984375 KiB
- Compilation Time: 0.67s

customer details 3.cpp

to accept the details of n employee.cpp

menu driven program of library in c.cpp

arranging student data in descending order.cpp

```
29     }
30     printf("\n-----\n");
31 }
32 for(i=0;i<2;i++)
33 {
34     for(j=1+1;j<2;j++)
35     {
36         if(stud[i].total<stud[j].total)
37         {
38             s=stud[i];
39             stud[i]=stud[j];
40             stud[j]=s;
41         }
42     }
43 }
44 printf("Records in Descending Order.\n (According to Total-Marks)");
45 printf("\n-----\n");
46 printf("\n ROLLNO   NAME   TOTAL-MARKS   AVG\n");
47 for(i=0;i<2;i++)
48 {
49     printf("\n %d\t %s\t %d\t %.2f",stud[i].rno,stud[i].name,stud[i].total,stud[i].avg);
50 }
51 return 0;
52
```

Compiler Resources Compile Log Debug Find Results Close

Abort Compilation

Shorten compiler paths

Compilation results...

```
-----
- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\arranging student data in descending order.exe
- Output Size: 129.833984375 KiB
- Compilation Time: 0.67s
```


Enter Record for Student-1

Enter Roll-No. : 101
Enter Name : sai
Enter Marks of Subject 1 : 100
Enter Marks of Subject 2 : 95
Enter Marks of Subject 3 : 96

Enter Record for Student-2

Enter Roll-No. : 102
Enter Name : bobby
Enter Marks of Subject 1 : 90
Enter Marks of Subject 2 : 85
Enter Marks of Subject 3 : 98

Records in Descending Order.
(According to Total-Marks)

ROLLNO	NAME	TOTAL-MARKS	AVG
01	sai	291	97.00
02	bobby	273	91.00

Process exited after 62.42 seconds with return value 0
Press any key to continue . . .

8. Write a program that declares a union variable data that can store an integer or a float value. Prompt the user to enter a value of their choice and store it in the appropriate member of the union. Then, print the value that was entered.

Edit Search View Project Execute Tools AStyle Window Help



TDM-GCC 4.9.2 64-bit Release

Minimize

(globals)

displaying employee details.cpp total runs scored by cricket team.cpp calculate the age of student at admission time.cpp customer details.cpp customer details 3.cpp
to accept the details of n employee.cpp menu driven program of library in c.cpp arranging student data in descending order.cpp c unions.cpp

```
1  #include <stdio.h>
2  #include <string.h>
3
4  union Data {
5      int i;
6      float f;
7      char str[20];
8  };
9
10 int main( )
11 {
12     union Data data;
13
14     printf( "Memory size occupied by data : %d\n", sizeof(data));
15
16     return 0;
17 }
```

Compiler Resources Compile Log Debug Find Results Close

About Compilation

shorten compiler paths

Compilation results...

```
- Errors: 0
- Warnings: 0
- Output Filename: C:\Users\hp\Documents\c unions.exe
- Output Size: 127.931640625 KiB
- Compilation Time: 0.56s
```

Memory size occupied by data : 20

Process exited after 0.07148 seconds with return value 0
Press any key to continue . . . █

9. Create a program that defines a union student that can store a student's name (up to 50 characters) and their GPA. Prompt the user to enter the student's name and GPA, and store them in the union. Then, print the student's name and GPA.

IDE interface showing a C++ program for student data management. The compiler is TDM-GCC 4.9.2 64-bit Release.

Project Explorer (globals):

- displaying employee details.cpp
- total runs scored by cricket team.cpp
- calculate the age of student at admission time.cpp
- customer details.cpp
- customer details 3.cpp
- to accept the details of n employee.cpp
- menu driven program of library in c.cpp
- arranging student data in descending order.cpp
- c unions.cpp
- students name and GPA.cpp

Code Editor (students name and GPA.cpp):

```
1 #include <stdio.h>
2 struct student {
3     char firstName[50];
4     int roll;
5     float marks;
6 } s[5];
7
8 int main() {
9     int i;
10    printf("Enter information of students:\n");
11    for (i = 0; i < 5; ++i) {
12        s[i].roll = i + 1;
13        printf("\nFor roll number%d,\n", s[i].roll);
14        printf("Enter first name: ");
15        scanf("%s", s[i].firstName);
16        printf("Enter marks: ");
17        scanf("%f", &s[i].marks);
18    }
19    printf("Displaying Information:\n\n");
20    for (i = 0; i < 5; ++i) {
21        printf("\nRoll number: %d\n", i + 1);
22        printf("First name: ");
23        puts(s[i].firstName);
24        printf("Marks: %.1f", s[i].marks);
25        printf("\n");
    }
```

Compiler (2) Resources Compile Log Debug Find Results Close

Message:

- C:\Program Files (x86)\Dev-Cpp\MinGW64\x86_64-w64-... cannot open output file C:\Users\hp\Documents\students name and GPA.exe: Permission denied
- C:\Users\hp\Documents\collect2.exe [Error] ld returned 1 exit status

File Edit Search View Project Execute Tools AStyle Window Help

TDM-GCC 4.9.2 64-bit Release

(globals)

Project Classes Debug

displaying employee details.cpp total runs scored by cricket team.cpp calculate the age of student at admission time.cpp customer details.cpp customer details 3.cpp
to accept the details of n employee.cpp menu driven program of library in c.cpp arranging student data in descending order.cpp c unions.cpp students name and GPA.cpp

```
6 } s[5];
7
8 int main() {
9     int i;
10    printf("Enter information of students:\n");
11    for (i = 0; i < 5; ++i) {
12        s[i].roll = i + 1;
13        printf("\nFor roll number %d,\n", s[i].roll);
14        printf("Enter first name: ");
15        scanf("%s", s[i].firstName);
16        printf("Enter marks: ");
17        scanf("%f", &s[i].marks);
18    }
19    printf("Displaying Information:\n\n");
20    for (i = 0; i < 5; ++i) {
21        printf("\nRoll number: %d\n", i + 1);
22        printf("First name: ");
23        puts(s[i].firstName);
24        printf("Marks: %.1f", s[i].marks);
25        printf("\n");
26    }
27    return 0;
28 }
29
```

Compiler (2) Resources Compile Log Debug Find Results Close

Line	Col	File	Message
		C:\Program Files (x86)\Dev-Cpp\MinGW64\x86_64-w64-...	cannot open output file C:\Users\hp\Documents\students name and GPA.exe: Permission denied
		C:\Users\hp\Documents\collect2.exe	[Error] ld returned 1 exit status

Enter information of students:

For roll number1,
Enter first name: SAI
Enter marks: 100

For roll number2,
Enter first name: BOBS
Enter marks: 95

For roll number3,
Enter first name: 3
Enter marks: 98

For roll number4,
Enter first name: SRI
Enter marks: 100

For roll number5,
Enter first name:
...
Enter marks:

10. Write a program that defines a union shape that can store a circle's radius or a rectangle's length and width. Prompt the user to enter the type of shape they want to calculate (circle or rectangle), and then prompt them to enter the appropriate dimensions. Calculate and print the area of the shape they entered.

```
1  #include<stdio.h>
2  #include<math.h>
3  main()
4  {
5      int choice;
6      printf("Enter
7          1 to find area of Triangle
8          2 for finding area of Square
9          3 for finding area of Circle
10         4 for finding area of Rectangle
11         5 for Parallelogram.);
12     scanf("%d",&choice);
13     switch(choice) {
14     case 1: {
15         int a,b,c;
16         float s,area;
17         printf("Enter sides of triangle");
18         scanf("%d%d %d",&a,&b,&c);
19         s=(float)(a+b+c)/2;
20         area=(float)(sqrt(s*(s-a)*(s-b)*(s-c)));
21         printf("Area of Triangle is %f",area);
22         break;
23     }
24     case 2: {
25         float side,area;
26         printf("Enter Sides of Square");
27         scanf("%f",&side);
28         area=(float)side*side;
29         printf("Area of Square is %f",area);
30         break;
31     }
32     case 3: {
33         float radius,area;
34         printf("Enter Radius of Circle");
35         scanf("%f",&radius);
36         area=(float)3.14159*radius*radius;
37         printf("Area of Circle %f",area);
```

```

26     printf("Enter Sides of Square");
27     scanf("%f",&side);
28     area=(float)side*side;
29     printf("Area of Square is %f",area);
30     break;
31 }
32 case 3: {
33     float radius,area;
34     printf("Enter Radius of Circle");
35     scanf("%f",&radius);
36     area=(float)3.14159*radius*radius;
37     printf("Area of Circle %f",area);
38     break;
39 }
40 case 4: {
41     float len,breadth,area;
42     printf("Enter Length and Breadth of Rectangle");
43     scanf("%f %f",&len,&breadth);
44     area=(float)len*breadth;
45     printf("Area of Rectangle is %f",area);
46     break;
47 }
48 case 5: {
49     float base,height,area;
50     printf("Enter base and height of Parallelogram");
51     scanf("%f %f",&base,&height);
52     area=(float)base*height;
53     printf("Enter area of Parallelogram is %f",area);
54     break;
55 }
56 default: {
57     printf("Invalid Choice");
58     break;
59 }
60 }
61 )

```