PACKAGE:

package mypackage;

import java.lang.Math;

public class Calculator

{

/\*\* add method adds two numbers

@param a First number

@param b Second number

@return sum

\*/

public double add(double a,double b)

{

return (a+b);

}

/\*\* sub method subtracts two numbers

@param a First number

@param b Second number

@return difference

\*/

public double sub(double a,double b)

{

return (a-b);

}

/\*\* mul method multiplies two numbers

@param a First number

@param b Second number

@return multiplied value

\*/

public double mul(double a,double b)

{

return (a\*b);

}

/\*\* div method divides two numbers

@param a First number

@param b Second number

@return the quotient

\*/

public double div(double a,double b)

{

return (a/b);

}

/\*\* mod method finds the remainder of the two numbers

@param a First number

@param b Second number

@return the remainder

\*/

public double mod(double a,double b)

{

return (a%b);

}

/\*\* power method finds the power of b over a

@param a First number

@param b Second number

@return the value of(a^b)

\*/

public double power(double a,double b)

{

return (Math.pow(a,b));

}

/\*\* sqroot method finds the square root of the entered number

@param a First number

@return the square root

\*/

public double sqroot(double a)

{

return (Math.sqrt(a));

}

}//class calculator close

MAIN PROGRAM:

import java.util.\*;

import mypackage.Calculator;

public class Calci

{

public static void main(String args[])

{

Calculator c=new Calculator();

Scanner s1=new Scanner(System.in);

do{

System.out.println("\n enter the first number");

double a=s1.nextDouble();

System.out.println("\n enter the second number");

double b=s1.nextDouble();

System.out.println("Menu");

System.out.println("1.Addition\n2.Substraction\n3.Multiplication\n4.Divison\n5.Mod\n6.Power\n7.Square root\n8.exit\n");

System.out.println("\nEnter your choice:\n");

int ch=s1.nextInt();

switch(ch)

{

case 1:

{

double v=c.add(a,b);

System.out.println("sum="+v);

break;

}

case 2:

{

double v=c.sub(a,b);

System.out.println("difference="+v);

break;

}

case 3:

{

double v=c.mul(a,b);

System.out.println("Product="+v);

break;

}

case 4:

{

double v=c.div(a,b);

System.out.println("Divison quotient="+v);

break;

}

case 5:

{

double v=c.mod(a,b);

System.out.println("Divison remainder="+v);

break;

}

case 6:

{

double v=c.power(a,b);

System.out.println("Square="+v);

break;

}

case 7:

{

double v=c.sqroot(a);

System.out.println("Square Root="+v);

break;

}

default:

{System.out.println("\nerror!");

System.exit(1);

break;}

}//switch close

}while(true);

}//public method close

}//class Calci close

SAMPLE INPUT AND OUTPUT:

Microsoft Windows [Version 6.1.7601]

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C:\Users\dell>cd..

C:\Users>cd..

C:\>cd java

C:\java>set path=%path%;C:\java\Java\jdk1.7.0\_21\bin

C:\java>javac Calci.java

C:\java>java Calci

enter the first number

2.3

enter the second number

4.5

Menu

1.Addition

2.Substraction

3.Multiplication

4.Divison

5.Mod

6.Power

7.Square root

8.exit

Enter your choice:

1

sum=6.8

enter the first number

1

enter the second number

2

Menu

1.Addition

2.Substraction

3.Multiplication

4.Divison

5.Mod

6.Power

7.Square root

8.exit

Enter your choice:

4

Divison quotient=0.5

enter the first number

49

enter the second number

7

Menu

1.Addition

2.Substraction

3.Multiplication

4.Divison

5.Mod

6.Power

7.Square root

8.exit

Enter your choice:

5

Divison remainder=0.0

enter the first number

34

enter the second number

17

Menu

1.Addition

2.Substraction

3.Multiplication

4.Divison

5.Mod

6.Power

7.Square root

8.exit

Enter your choice:

2

difference=17.0

enter the first number

2

enter the second number

5

Menu

1.Addition

2.Substraction

3.Multiplication

4.Divison

5.Mod

6.Power

7.Square root

8.exit

Enter your choice:

6

Square=32.0

enter the first number

144

enter the second number

1

Menu

1.Addition

2.Substraction

3.Multiplication

4.Divison

5.Mod

6.Power

7.Square root

8.exit

Enter your choice:

7

Square Root=12.0

enter the first number

8

enter the second number

1

Menu

1.Addition

2.Substraction

3.Multiplication

4.Divison

5.Mod

6.Power

7.Square root

8.exit

Enter your choice:

8

error!

C:\java>