```
/////////////////////////////////
Q290 Case XIV
==============
class Example{
        public static int printTotal(int a,int b){
                int tot;
                tot=a+b;
                return tot;
                System.out.println("tot : "+tot);
        }
        public static void main(String args[]){
                printTotal(10,20);
        }
}


/////////////////////////////////////////////////////////////////////
Q291 Case XV
============
class Example{
        public static char grade(double avg){
                if(avg>=75){
                        return 'A';
                }else if(avg>=65){
                        return 'B';
                }else if(avg>=45){
                        return 'C';
                }else if(avg>=25){
                        return 'D';
                }
        }
        public static void main(String args[]){

        }
}


/////////////////////////////////////////////////////////////////////
Q292 Option 1 for Q291
==================
class Example{
        public static char grade(double avg){
                if(avg>=75){
                        return 'A';
                }else if(avg>=65){
                        return 'B';
                }else if(avg>=45){
```

```
                return 'C';
        }else if(avg>=25){
                return 'D';
        }else{
                return 'E';
        }
    }
    public static void main(String args[]){

    }
}
```

//
Q293 Option 2 for Q291
===================

```
class Example{
    public static char grade(double avg){
        if(avg>=75){
                return 'A';
        }else if(avg>=65){
                return 'B';
        }else if(avg>=45){
                return 'C';
        }else if(avg>=25){
                return 'D';
        }
        return 'E';
    }
    public static void main(String args[]){

    }
}
```

//
Q294 Option 3 for Q291
==================

```
class Example{
    public static char grade(double avg){
        if(avg>=75){
                return 'A';
        }else if(avg>=65){
                return 'B';
        }else if(avg>=45){
                return 'C';
        }else if(avg>=25){
```

```
                        return 'D';
                }else{
                        return 'E';
                }
                return 'F'; //Illegal
        }
        public static void main(String args[]){


        }
}
```

//
Q295 Case XVI
============
```
class Example{
        public static void printTotal(int a,int b){
                int tot;
                tot=a+b;
                System.out.println(a+" " +b+" = "+tot);
        }
        public static int getTotal(int a,int b){
                int tot;
                tot=a+b;
                System.out.println(a+" " +b+" = "+tot);
                return tot;
        }
        public static void main(String args[]){
                printTotal(10,20);
                getTotal(10,20); //Legal
        }
}
```

//
Q296 Case XVII
============
```
class Example{
        public static void printTotal(int a,int b){
                int tot;
                tot=a+b;
                System.out.println(a+" " +b+" = "+tot);
        }
        public static int getTotal(int a,int b){
                int tot;
                tot=a+b;
                System.out.println(a+" " +b+" = "+tot);
```

```
                return tot;
        }
        public static void main(String args[]){
                int tot;
                tot=printTotal(10,20);
                tot=getTotal(10,20);
                System.out.println(printTotal(10,20));
                System.out.println(getTotal(10,20));
        }
}
```

//
Q297 Exercise
===========
```
class Example{
        public static void main(String args[]){

                System.out.println(x); //12-->output-->100
                System.out.println(x());//13->output-->100
        }
}
```

//
Q298 From Q297
=============
```
class Example{
        public static int x(){
                return 100;
        }
        public static void main(String args[]){
                int x=100;
                System.out.println(x); //12-->output-->100
                System.out.println(x());//13->output-->100
        }
}
```

//
Q299 Exercise
===========
```
class Example{
        public static int x(int x){
                return ++x;
        }
        public static void main(String args[]){
                int x=100;
```

```
                System.out.println(x(++x)+x(++x)+x(++x));
        }
}


/////////////////////////////////////////////////////////////////
Q300 Exercise
==========
class Example{
        public static int x(int x){
                return x++;
        }
        public static void main(String args[]){
                int x=100;
                System.out.println(x(x++));
                System.out.println(x=x(x++));
        }
}


/////////////////////////////////////////////////////////////////
        Method Overloading
/////////////////////////////////////////////////////////////////
Q301 Exercise
==========
class Example{
        //
        //
        public static void main(String args[]){
                int a=-123;
                long b=-123;
                float c=-123.0f;
                double d=-123.0;

                a=abs(a);
                b=abs(b);
                c=abs(c);
                d=abs(d);

                System.out.println("absolute value of a : "+a); //123
                System.out.println("absolute value of b : "+b); //123
                System.out.println("absolute value of c : "+c); //123.0
                System.out.println("absolute value of d : "+d); //123.0
        }
}
```

```
/////////////////////////////////////////////////////////////////////
Q302 From Q301
============
class Example{
        public static double abs(double num){
                return num<0 ? -num:num;
        }
        public static void main(String args[]){
                int a=-123;
                long b=-123;
                float c=-123.0f;
                double d=-123.0;

                a=abs(a);
                b=abs(b);
                c=abs(c);
                d=abs(d);

                System.out.println("absolute value of a : "+a); //123
                System.out.println("absolute value of b : "+b); //123
                System.out.println("absolute value of c : "+c); //123.0
                System.out.println("absolute value of d : "+d); //123.0
        }
}

/////////////////////////////////////////////////////////////////////
Q303 From Q301 Using method overloading
==================================
class Example{
        public static double abs(double num){
                return num<0 ? -num:num;
        }
        public static float abs(float num){
                return num<0 ? -num:num;
        }
        public static long abs(long num){
                return num<0 ? -num:num;
        }
        public static int abs(int num){
                return num<0 ? -num:num;
        }
        public static void main(String args[]){
                int a=-123;
                long b=-123;
                float c=-123.0f;
```

```
                double d=-123.0;

                a=abs(a);
                b=abs(b);
                c=abs(c);
                d=abs(d);

                System.out.println("absolute value of a : "+a); //123
                System.out.println("absolute value of b : "+b); //123
                System.out.println("absolute value of c : "+c); //123.0
                System.out.println("absolute value of d : "+d); //123.0
        }
}
```

//
Q304 Exercise
===========
```
class Example{
        public static void myMethod(int x){
                System.out.println("myMethod1(int)");
        }
        public static void myMethod(int x){
                System.out.println("myMethod2(int)");
        }
        public static void main(String args[]){
                myMethod(100);
        }
}
```

//
Q305 Case I
=========
```
class Example{
        public static void myMethod(int x){
                System.out.println("myMethod(int)");
        }
        public static void myMethod(double x){
                System.out.println("myMethod(double)");
        }
        public static void main(String args[]){
                myMethod(100);
                myMethod(100.0);
        }
}
```

```
////////////////////////////////////////////////////////////////////////////
Q306 Case II
==========
class Example{
        public static void myMethod(int x){
                System.out.println("myMethod(int)");
        }
        public static void myMethod(int x, int y){
                System.out.println("myMethod(int,int)");
        }
        public static void main(String args[]){
                myMethod(100);
                myMethod(100,200);
        }
}


////////////////////////////////////////////////////////////////////////////
Q307 Case III
==========
class Example{
        public static void myMethod(int x,double y){
                System.out.println("myMethod(int,double)");
        }
        public static void myMethod(double x, int y){
                System.out.println("myMethod(double,int)");
        }
        public static void main(String args[]){
                myMethod(100,100.0);
                myMethod(100.0,200);
        }
}


////////////////////////////////////////////////////////////////////////////
Q308 Case IV
==========
class Example{
        public static void myMethod(int x,double y){
                System.out.println("myMethod(int,double)");
        }
        public static void myMethod(double x, int y){
                System.out.println("myMethod(double,int)");
        }
        public static void main(String args[]){
                myMethod(100,200); //Illegal->wrong argument set
```

```
        }
}

//////////////////////////////////////////////////////////////////////
Q309 Case V
==========
class Example{
        public static void myMethod(int itemCode){
                System.out.println("myMethod(int-itemCode)");
        }
        public static void myMethod(int customerCode){
                System.out.println("myMethod(int-customerCode)");
        }
        public static void main(String args[]){


        }
}

//////////////////////////////////////////////////////////////////////
Q310 Case VI
===========
class Example{
        public static char myMethod(){
                System.out.println("myMethod()");
                return 'A';
        }
        public static double myMethod(){
                System.out.println("myMethod()");
                return 1.234;
        }
        public static void main(String args[]){


        }
}

//////////////////////////////////////////////////////////////////////
Q311 Case VII
===========
class Example{
        public static char myMethod(int x){
                System.out.println("myMethod(int)");
                return 'A';
        }
        public static double myMethod(double x){ //Legal
```

```
                System.out.println("myMethod(double)");
                return 1.234;
        }
        public static void main(String args[]){

        }
}
```

//
Q312

//
Q313

//
Q314

//
Q315

//
Q316

//
Q317

//
Q318

//
Q319

//
Q320