Difference between Error and Exception
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Throwable

It is the supermost class which defines all types of error and exceptions.

1. **Exception**
2. **Error**

Error

- It is an unexpected event which interrupts or blocks the normal flow of program execution which is not handled by the application or program.
- E.x - syntax error, wrong version of any library

Exception

- It is an unexpected event which interrupts or breaks the normal flow of execution but the application may handle it.
- There are two ways for this
  - By using try and catch block
  - By using throws keyword

1. **By using try and catch block**

The try statement defines the code block to run (to try).
The catch statement defines a code block to handle any error.

Syntax - try {
tryCode - Code block to run }
catch(*error*) {
catchCode - Code block to handle errors
}

E.x

```
package testJava;

public class dclass {
	public static void main(String[] args) {

		int a = 2;
		int b = 0;

		try {
			int c = a / b;
			System.out.println(c);

		} catch (ArithmeticException e) {
			System.out.println("it gives an arithmetic exception");
```

```
                }

                System.out.println("program continue");
        }
}
```

Output -

it gives an arithmetic exception
program continue

=========

What is Finally block

It is a block which is used to place an important code which must be executed whether an exception is handled or not.

E.x

```
package Testing_Package;

public class newclas
{
        public static void main(String[] args)
        {
                int a = 5;
                int b = 0;

                try
                {
                        int c = a / b;
                        System.out.println(c);
                }
                catch (ArithmeticException e)
                        {
                                System.out.println("It gives an A exception" );
                        }

                finally
                {
                        System.out.println("must be executed");
                }
        }
}
```

What is the difference between final, finally and finalize().

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Final keyword > final keyword is nothing but an access modifier, which is used to apply restrictions on variables, methods and class.

Finally block > It is a block which is used to place an important code which must be executed whether an exception is handled or not.

Finalize() method > Finalize is a method which is used to perform cleanup operations just before an object is garbage collected.