

the execution procedure of methods in JUnit, which defines the order of the methods called. Discussed below is the execution procedure of the JUnit test API methods with example.

Create a java class file named ExecutionProcedureJUnit.java in C:\>JUNIT\_WORKSPACE to test annotation.

```
import org.junit.After;
import org.junit.AfterClass;

import org.junit.Before;
import org.junit.BeforeClass;

import org.junit.Ignore;
import org.junit.Test;

public class ExecutionProcedureJUnit {

    //execute only once, in the starting
    @BeforeClass
    public static void beforeClass() {
        System.out.println("in before class");
    }

    //execute only once, in the end
    @AfterClass
    public static void afterClass() {
        System.out.println("in after class");
    }

    //execute for each test, before executing test
    @Before
```

```

public void before() {
    System.out.println("in before");
}

//execute for each test, after executing test
@After
public void after() {
    System.out.println("in after");
}

//test case 1
@Test
public void testCase1() {
    System.out.println("in test case 1");
}

//test case 2
@Test
public void testCase2() {
    System.out.println("in test case 2");
}
}

```

Next, create a java class file named **TestRunner.java** in C:\>JUNIT\_WORKSPACE to execute annotations.

```

import org.junit.runner.JUnitCore;
import org.junit.runner.Result;
import org.junit.runner.notification.Failure;

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

```

```

    Result result = JUnitCore.runClasses(ExecutionProcedureJUnit.class);

    for (Failure failure : result.getFailures()) {
        System.out.println(failure.toString());
    }

    System.out.println(result.wasSuccessful());
}
}

```

Compile the Test case and Test Runner classes using javac.

```
C:\JUNIT_WORKSPACE>javac ExecutionProcedureJUnit.java TestRunner.java
```

Now run the Test Runner, which will run the test case defined in the provided Test Case class.

```
C:\JUNIT_WORKSPACE>java TestRunner
```

Verify the output.

```

in before class
in before
in test case 1
in after
in before
in test case 2
in after
in after class

```

See the above output. The execution procedure is as follows –

- First of all, the beforeClass() method executes only once.
- The afterClass() method executes only once.
- The before() method executes for each test case, but before executing the test case.
- The after() method executes for each test case, but after the execution of test case.
- In between before() and after(), each test case executes.