

```

package com.sxt.others;

/**
 * 可重入锁:锁可以延续使用+计数器
 * @author 江
 *
 */

public class LockTest03 {
    ReLock lock=new ReLock();
    public void a() throws InterruptedException {
        lock.lock();
        System.err.println(lock.getHoldCount());
        doSomething();
        lock.unlock();
        System.err.println(lock.getHoldCount());
    }

    public void doSomething() throws InterruptedException {
        lock.lock();
        System.err.println(lock.getHoldCount());
        lock.unlock();
        System.err.println(lock.getHoldCount());
    }

    public static void main(String[] args) throws InterruptedException {
        LockTest03 lt=new LockTest03();
        lt.a();

        Thread.sleep(1000);

        System.err.println(lt.lock.getHoldCount());
    }

}

class ReLock{

```

//是否占用

```
private boolean isLocked=false;
```

```
Thread lockedBy=null;//存储线程
```

```
private int holdCount=0;
```

//使用锁

```
public synchronized void lock() throws InterruptedException {
```

```
    Thread t=Thread.currentThread();
```

```
    while(isLocked&&lockedBy!=t) {
```

```
        wait();
```

```
    }
```

```
    isLocked=true;
```

```
    lockedBy=t;
```

```
    holdCount++;
```

```
}
```

//释放锁

```
public synchronized void unlock() {
```

```
    if(Thread.currentThread()==lockedBy) {
```

```
        holdCount--;
```

```
        if(holdCount==0) {
```

```
            isLocked=false;
```

```
            notify();
```

```
            lockedBy=null;
```

```
        }
```

```
}
```

```
}
```

```
public int getHoldCount() {
```

```
    return holdCount;
```

```
}
```

```
}
```