Exercise 6: Lazy Loading Image Viewer Using Proxy Pattern

Approach and Understanding:

In this problem, I made a system that can **load and display images slowly (lazily) only when needed.**

**Code**

import java.util.Scanner; interface p {

void show();

}

class real implements p { private String n;

public real(String n) { this.n = n;

load();

}

private void load() { System.out.println("load " + n);

}

public void show() { System.out.println("see " + n);

}

}

class proxy implements p { private String n;

private real r;

public proxy(String n) { this.n = n;

}

public void show() { if (r == null) {

r = new real(n);

}

r.show();

}

}

public class test {

public static void main(String[] a) { p x = new proxy("pic1.jpg");

p y = new proxy("pic2.jpg");

System.out.println("first show pic1:"); x.show();

System.out.println("\nsecond show pic1:"); x.show();

System.out.println("\nshow pic2:"); y.show();

System.out.println("\nshow pic1 again:"); x.show();

}

}

**OUTPUT:**

