**Mediator Pattern Example: Purchase**

**Class: Welcome**

**package** purchase;

**import** java.io.\*;

**public** **class** Welcome

{

Mediator mediator;

String response = "n";

**public** Welcome(Mediator m)

{

mediator = m;

}

**public** **void** go()

{

System.***out***.print(

"Do you want to shop? [y/n]? ");

BufferedReader reader = **new**

BufferedReader(**new** InputStreamReader(System.***in***));

**try**{

response = reader.readLine();

} **catch** (IOException e){

System.***err***.println("Error");

}

**if** (response.equals("y")){

mediator.handle("welcome.shop");

} **else** {

mediator.handle("welcome.exit");

}

}

}

**Class: Purchase**

**package** purchase;

**import** java.io.\*;

**public** **class** Purchase

{

Mediator mediator;

String response = "n";

**public** Purchase(Mediator m)

{

mediator = m;

}

**public** **void** go()

{

System.***out***.print(

"Buy the item now? [y/n]? ");

BufferedReader reader = **new**

BufferedReader(**new** InputStreamReader(System.***in***));

**try**{

response = reader.readLine();

} **catch** (IOException e){

System.***err***.println("Error");

}

**if** (response.equals("y")){

System.***out***.println("Thanks for your purchase.");

}

mediator.handle("purchase.exit");

}

}

**Class: Shop**

**package** purchase;

**import** java.io.\*;

**public** **class** Shop

{

Mediator mediator;

String response = "n";

**public** Shop(Mediator m)

{

mediator = m;

}

**public** **void** go()

{

System.***out***.print(

"Are you ready to purchase? [y/n]? ");

BufferedReader reader = **new**

BufferedReader(**new** InputStreamReader(System.***in***));

**try**{

response = reader.readLine();

} **catch** (IOException e){

System.***err***.println("Error");

}

**if** (response.equals("y")){

mediator.handle("shop.purchase");

} **else** {

mediator.handle("shop.exit");

}

}

}

**Class: Exit**

**package** purchase;

**public** **class** Exit

{

Mediator mediator;

**public** Exit(Mediator m)

{

mediator = m;

}

**public** **void** go()

{

System.***out***.println("Please come again sometime.");

}

}

**Class: Mediator**

**package** purchase;

**public** **class** Mediator

{

Welcome welcome;

Shop shop;

Purchase purchase;

Exit exit;

**public** Mediator()

{

welcome = **new** Welcome(**this**);

shop = **new** Shop(**this**);

purchase = **new** Purchase(**this**);

exit = **new** Exit(**this**);

}

**public** **void** handle(String state)

{

**if**(state.equals("welcome.shop")){

shop.go();

} **else** **if**(state.equals("shop.purchase")){

purchase.go();

} **else** **if**(state.equals("purchase.exit")){

exit.go();

} **else** **if**(state.equals("welcome.exit")){

exit.go();

} **else** **if**(state.equals("shop.exit")){

exit.go();

} **else** **if**(state.equals("purchase.exit")){

exit.go();

}

}

**public** Welcome getWelcome()

{

**return** welcome;

}

}

**Class: TestMediator**

**package** purchase;

**public** **class** TestMediator

{

**public** **static** **void** main(String args[])

{

TestMediator t = **new** TestMediator();

}

**public** TestMediator()

{

Mediator mediator = **new** Mediator();

mediator.getWelcome().go();

}

}

Result:

Do you want to shop? [y/n]? y

Are you ready to purchase? [y/n]? y

Buy the item now? [y/n]? y

Thanks for your purchase.

Please come again sometime.

Do you want to shop? [y/n]? y

Are you ready to purchase? [y/n]? y

Buy the item now? [y/n]? n

Please come again sometime.

Do you want to shop? [y/n]? y

Are you ready to purchase? [y/n]? n

Please come again sometime.

Do you want to shop? [y/n]? n

Please come again sometime.