**class** Goods {

**private** String name;

**private** **int** price;

**private** **int** stock;

**private** **int** sold=0;

Goods(String name, **int** price, **int** stock) {

**this**.name = name;

**this**.price = price;

**this**.stock = stock;

}

String getName() {**return** name;}

**int** getPrice() {**return** price;}

**int** getStock() {**return** stock;}

**int** getSold() {**return** sold;}

**void** setSold() {sold++; }

**void** clearSold() {sold=0;}

**void** setStock(**int** n) {stock+=n;}

}

**import** java.util.Scanner;

**public** **class** GoodsArray {

**static** **void** sellGoods(Goods[] goodsArray) {

Scanner sc = **new** Scanner(System.***in***);

**while**(**true**) {

**for**(**int** i=0;i<goodsArray.length;i++) {

System.***out***.print((i+1)+ ") " +goodsArray[i].getName() +" ");

}

System.***out***.print((goodsArray.length+1) + ") 계산 ");

**int** n= sc.nextInt();

**if**(n==goodsArray.length+1)

**break**;

**if**(goodsArray[n-1].getStock()-goodsArray[n-1].getSold()<=0)

System.***out***.println("재고 부족");

**else**

goodsArray[n-1].setSold(); //판매 증가

}

**int** sum=0;

**for**(**int** i=0;i<goodsArray.length;i++) {

sum+=goodsArray[i].getPrice()\*goodsArray[i].getSold(); //총합

}

**while**(**true**) { //영수증

System.***out***.println("판매 가격 총액:"+sum);

System.***out***.println("받은 금액을 입력하시오.");

**int** pay=sc.nextInt();

**if**(pay>=sum) {

System.***out***.println("### 영수증 ### ");

System.***out***.println("=======================");

**for**(**int** i=0;i<goodsArray.length;i++) {

System.***out***.print(goodsArray[i].getName()+" ");

System.***out***.print(goodsArray[i].getPrice()+"x"+goodsArray[i].getSold()+" ");

System.***out***.println(goodsArray[i].getPrice()\*goodsArray[i].getSold());

}

System.***out***.println("=======================");

System.***out***.println("총액 "+sum);

System.***out***.println("받은금액 "+pay);

System.***out***.println("=======================");

System.***out***.println("거스름돈 "+(pay-sum));

**for**(**int** i=0;i<goodsArray.length;i++) {

goodsArray[i].setStock(-goodsArray[i].getSold()); //재고 정리

goodsArray[i].clearSold(); //판매 초기화

}

**break**;

}

}

}

**static** **void** buyGoods(Goods[] goodsArray) {

Scanner sc = **new** Scanner(System.***in***);

**while**(**true**) {

**for**(**int** i=0;i<goodsArray.length;i++) {

System.***out***.print((i+1)+ ") " +goodsArray[i].getName() +" ");

}

System.***out***.print((goodsArray.length+1) + ") 구매 종료 ");

**int** n= sc.nextInt();

**if**(n==goodsArray.length+1)

**break**;

System.***out***.println("구매 수량을 입력하시오.");

**int** m= sc.nextInt();

goodsArray[n-1].setStock(m); //재고 증가

System.***out***.println("## "+goodsArray[n-1].getName()+"의 재고량이 "+goodsArray[n-1].getStock()+"으로 증가 함");

}

}

**static** **void** checkGoods(Goods[] goodsArray) {

System.***out***.println("### 상품명 재고량 ### ");

System.***out***.println("==============================");

**for**(**int** i=0;i<goodsArray.length;i++) {

System.***out***.print(" " + goodsArray[i].getName());

System.***out***.println(" " + goodsArray[i].getStock());

}

System.***out***.println("==============================");

}

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

Scanner s = **new** Scanner(System.***in***);

System.***out***.println("슈퍼에서 취급하는 상품의 개수를 입력하시오");

**int** n=s.nextInt();

Goods [] goodsArray = **new** Goods [n];

**for**(**int** i=0; i<n; i++) {

System.***out***.println((i+1)+"번째 상품의 이름, 가격, 재고량을 입력하시오.");

String name = s.next();

**int** price = s.nextInt();

**int** stock = s.nextInt();

goodsArray[i] = **new** Goods(name, price, stock);

}

**while**(**true**) {

System.***out***.println("1)판매 2)구매 3)조회 4)종료");

**int** a=s.nextInt();

**if**(a==1)

*sellGoods*(goodsArray);

**else** **if**(a==2)

*buyGoods*(goodsArray);

**else** **if** (a==3)

*checkGoods*(goodsArray);

**else** **if** (a==4)

**break**;

}

}

}