Java 2 Extra Homework

1. Write a Java program to get a number and print whether it is positive or negative.
2. Write a program with two int variables, int x and int y, and give each one a value. Depending on their values, print “x is bigger than y”, “x is smaller than y”, or “x and y are the same”. Change the values and run the program a few times to check it works.
3. Write a Java program that when entering an integer between 1 and 7 displays the name of the weekday.
4. Modify the program from Exercise 2 so it also prints the difference between x and y.

Scanner scanner = new Scanner(System.in);

System.out.println("Enter a number:");

int number = scanner.nextInt();

if (number > 0) {

System.out.println("The number is positive.");

} else if (number < 0) {

System.out.println("The number is negative.");

} else {

System.out.println("The number is zero.");

}

// Exercise 2: Write a program with two int variables, int x and int y, and give each one a value. Depending on their values, print “x is bigger than y”, “x is smaller than y”, or “x and y are the same”. Change the values and run the program a few times to check it works.

int x = 10;

int y = 5;

if (x > y) {

System.out.println("x is bigger than y");

} else if (x < y) {

System.out.println("x is smaller than y");

} else {

System.out.println("x and y are the same");

}

// Exercise 3: Write a Java program that when entering an integer between 1 and 7 displays the name of the weekday.

System.out.println("Enter an integer between 1 and 7:");

int day = scanner.nextInt();

switch (day) {

case 1:

System.out.println("Monday");

break;

case 2:

System.out.println("Tuesday");

break;

case 3:

System.out.println("Wednesday");

break;

case 4:

System.out.println("Thursday");

break;

case 5:

System.out.println("Friday");

break;

case 6:

System.out.println("Saturday");

break;

case 7:

System.out.println("Sunday");

break;

default:

System.out.println("Invalid input");

break;

}

// Exercise 4: Modify the program from Exercise 2 so it also prints the difference between x and y.

if (x > y) {

System.out.println("x is bigger than y by " + (x - y));

} else if (x < y) {

System.out.println("x is smaller than y by " + (y - x));

} else {

System.out.println("x and y are the same, so the difference is zero");

}

scanner.close();

}

}