1. **Write a java program to convert int to byte, double to byte and double to byte.**

import java.util.Scanner;

class Demo {

public static void main(String args[]) {

byte x;

int a = 270;

double b = 128.128;

System.out.println("int converted to byte");

x = (byte) a;

System.out.println("a and x " + a + " " + x);

System.out.println("double converted to int");

a = (int) b;

System.out.println("b and a " + b + " " + a);

System.out.println("\ndouble converted to byte");

x = (byte)b;

System.out.println("b and x " + b + " " + x);

}

}

**Output:**

int converted to byte

a and x 270 14

double converted to int

b and a 128.128 128

double converted to byte

b and x 128.128 -128

1. **Write a java program to print prime numbers from 1 to 100.**

import java.util.Scanner;

public class primeNumbersFoundber {

public static void main(String[] args) {

int i;

int num = 0;

int maxCheck = 100;

boolean isPrime = true;

String primeNumbersFound = "";

for (i = 2; i <= maxCheck; i++) {

isPrime = CheckPrime(i);

if (isPrime) {

primeNumbersFound = primeNumbersFound + i + " ";

}

}

System.out.println("Prime numbers from 1 to " + maxCheck + " are:");

System.out.println(primeNumbersFound);

}

public static boolean CheckPrime(int numberToCheck) {

int remainder;

for (int i = 2; i <= numberToCheck / 2; i++) {

remainder = numberToCheck % i;

if (remainder == 0) {

return false;

}

}

return true;

}

}

**Output:**

Prime numbers from 1 to 100 are:

1. 3 5 7 11 13 17 19 23 29 31 37 41 43 47 53 59 61 67 71 73 79 83 89 97
2. **Write a java program to check wheater the addition of given inputs x,y is less than 10 or greater than 20.**

import java.util.Scanner;

public class Student {

public static void main(String[] args) {

int x = 10;

int y = 12;

if(x+y < 10) {

System.out.println("x + y is less than      10");

}  else {

System.out.println("x + y is greater than 20");

}

}

}

**Output:**

X+Y is greater than 20

1. **Write a java program for BMI.**

import java.util.Scanner;

public class Exercise6 {

public static void main(String[] Strings) {

Scanner input = new Scanner(System.in);

System.out.print("Input weight in pounds: ");

double weight = input.nextDouble();

System.out.print("Input height in inches: ");

double inches = input.nextDouble();

double BMI = weight \* 0.45359237 / (inches \* 0.0254 \* inches \* 0.0254);

System.out.print("Body Mass Index is " + BMI+"\n");

}

}

**Output:**

Input weight in pounds:452

Input height in inches: 72

Body Mass Index is 61.30159143458721

1. **Write a java program to reverse a given string.**

import java.util.Scanner;

public class ReverseString {

public static void main(String[] args) {

String original = "kavana, hima";

String reversed = reverseString(original);

System.out.println("Original: " + original);

System.out.println("Reversed: " + reversed);

}

public static String reverseString(String str) {

char[] charArray = str.toCharArray();

int left = 0;

int right = charArray.length - 1;

while (left < right) {

char temp = charArray[left];

charArray[left] = charArray[right];

charArray[right] = temp;

left++;

right--;

}

return new String(charArray);

}

}

**Output:**

Original: kavana, hima

Reversed: amih ,anavak