Public class CalculateG {

Public static double multiply(double x, double y){

Return x \* y;

}

Public static double square(double x){

Return x \* x;

}

Public static double sum(double x, double y){

Return x + y;

}

Public static void outputResult(double position, double velocity){

System.out.println(“The object’s position after 30 seconds is “ + position + “ m.”);

System.out.println(“The object’s velocity after 30 seconds is “ + velocity + “ m/s.”);

}

Public static void main(String[] arguments){

Double gravity = -9.81; // Earth’s gravity in m/s^2

Double fallingTime = 30;

Double initialVelocity = 0.0;

Double finalVelocity = gravity \* fallingTime + initialVelocity;

Double initialPosition = 0.0;

Double finalPosition = 0.5 \* gravity \* square(fallingTime) + initialVelocity \* fallingTime + initialPosition;

outputResult(finalPosition, finalVelocity);

}

}