Givens: none
Results: none
Intermediates:
  first, second, third  (three scores)
  average  (average of scores, out of 100)
Header: main()
Body:
  (Read in scores from the user)
  1. printLine("Please enter three scores")
  2. first ← readReal()
  3. second ← readReal()
  4. third ← readReal()
     (Call the markUser algorithm)
  5. average ← markResult(first, second, third)
     (Print the average for the user)
  6. printLine("The average is ", average)

Givens: score1, score2, score3  (scores out of 25)
Results: avgPct  (average of scores, out of 100)
Intermediates: sum  (sum of scores)
               avgOutOf25(average of scores, out of 25)
Header: avgPct ← markResult(score1, score2, score3)
Body:
  1. sum ← score1 + score2 + score3
  2. avgOutOf25 ← sum / 3
  3. avgPct ← avgOutOf25 * 4
Exercise 3-2 - Swap 2 Values

GIVENS: x, y (two numbers)
RESULTS:  
MODIFIEDS: x, y (swapped)
INTERMEDIATES:  
    temp (temporary storage for x)
HEADER:     swap( x, y)
BODY:
    temp ← x
    x ← y
    y ← temp
```java
public static void main(String[] args) {
    // SET UP KEYBOARD INPUT
    Scanner keyboard = new Scanner(System.in);
    // DECLARE VARIABLES/DATA DICTIONARY
    double first, second, third; // three scores
    double average; // average of scores
    // READ IN Values from the user
    System.out.println("Please enter 3 score values: ");
    first = keyboard.nextDouble();
    second = keyboard.nextDouble();
    third = keyboard.nextDouble();
    // Call to markResults
    average = markResult(first, second, third);
    // PRINT OUT RESULTS
    System.out.println("The average is "+average);
}
public static double markResult(double score1, double score2, double score3) {
    // Intermediate variables
    double sum; // sum of score1, score2, score3
    double avgOutOf25; // Average out of 25
    // Result variable
    double avgPct; // average out of 100
    // BODY OF ALGORITHM
    sum = score1 + score2 + score3;
    avgOutOf25 = sum / 3.0;
    avgPct = avgOutOf25*4;
    // RETURN RESULTS
    return avgPct;
}
```