1 **import** java.util.Arrays;

2 **public** **class** ArraysClass

3 {

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

5 {

6 String[] stringArray = {"Tom","Mary","Bob","Alice","Joe","Fred"};

7 String[] copyStringArray;

8 **int**[] intArray = { 3, 5, 2, 8, 6, 4};

9 **int**[] copyIntArray;

10 **int**[] filledIntArray;

11

12 **//outputting the elements of an arrays**

13 System.out.println("Outputing arrays using the " +

14 "Arrays.toString method");

15 System.out.println(Arrays.toString(stringArray));

16 System.out.println(Arrays.toString(intArray));

17

18 **//copying the elements of an array;**

19 System.out.println("\nCopying arrays using the " +

20 "Arrays.copyOf method");

21 copyStringArray = Arrays.copyOf(stringArray, 10);

22 System.out.println(Arrays.toString(copyStringArray));

23 copyIntArray = Arrays.copyOf(intArray, intArray.length);

24 System.out.println(Arrays.toString(copyIntArray));

25

26 **//determining if all the elements of two arrays are equal**

27 System.out.println("\nTesting two arrays for equality " +

28 "using the Arrays.equals method");

29 System.out.println(Arrays.equals(intArray, copyIntArray));

30 copyIntArray[0] = 1;

31 System.out.println(Arrays.equals(intArray, copyIntArray));

32

33 **//sorting arrays**

34 System.out.println("\nSorting all or part of an array: " +

35 "the Arrays.sort method");

36 Arrays.sort(stringArray);

37 System.out.println(Arrays.toString(stringArray));

38 Arrays.sort(intArray, 1, 5);

39 System.out.println(Arrays.toString(intArray));

40

41 **//searching for an element of a sorted array**

42 System.out.println("\nSearching for a value: the " +

43 "Arrays.binarySearch method");

44 System.out.println(Arrays.binarySearch(stringArray, "Fred"));

45 System.out.println(Arrays.binarySearch(stringArray, "Doris"));

46

47 **//copying a part of an array**

48 System.out.println("\nPartial copies: the " +

49 "Arrays.copy and copyRange methods");

50 copyIntArray = Arrays.copyOf(intArray, 4);

51 System.out.println(Arrays.toString(copyIntArray));

52 copyIntArray = Arrays.copyRangeOf(intArray, 2, 10);

53 System.out.println(Arrays.toString(copyIntArray));

54

55 **//setting all elements of a array to one value**

56 System.out.println("\nFilling all or part of an array: " +

57 "the Arrays.fill method");

58 Arrays.fill(intArray, 4);

59 System.out.println(Arrays.toString(intArray));

60 Arrays.fill(stringArray, 1, 4, "FillValue");

61 System.out.println(Arrays.toString(stringArray));

62 }

63 }

**Figure 6.27 The application ArraysClass.**