1 **import** edu.sjcny.gpv1.\*;

2 **import** java.awt.\*;

3 **import** javax.swing.\*;

4

5 **public class** CheckerBoard **extends** DrawableAdapter

6 {

7 **static** CheckerBoard ge = **new** CheckerBoard ();

8 **static** GameBoard gb = **new** GameBoard(ge, "Nested For loops");

9

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

11 {

12 showGameBoard(gb);

13 }

14

15 **public void** draw(Graphics g)

16 {

17 **int** xBox = 12;

18 **int** yBox = 50;

19 **int** boxWidth = 60;

20 **int** boxHeight = 53;

21 **int** firstCheckerCol = 1;

22 **int** checkerX = 20;

23 **int** checkerY = 55;

24 Color firstColor = Color.BLACK;

25 Color secondColor = Color.RED;

26 Color temp;

27

28 gb.setBackground(Color.LIGHT\_GRAY);

29

30 **//Draw the checker board boxes**

31 **for**(**int** row = 1; row <= 8; row++) **//each row**

32 {

33 **for**(**int** col = 1; col <=8; col++) **//each column**

34 {

36 g. setColor(firstColor);

36 **if**(col % 2 == 0)

37 {

38 g. setColor(secondColor);

39 }

40 g.fillRect(xBox, yBox, boxWidth, boxHeight);

41 xBox = xBox + boxWidth;

42 }

43 yBox = yBox + boxHeight;

44 xBox = 12;

45

46 **temp = firstColor; //swap the box colors**

47 firstColor = secondColor;

48 secondColor = temp;

49 }

50

51 **//Draw the red checkers**

52 **for**(**int** row = 1; row <= 3; row++) **//first three rows**

53 {

54 **if**(row % 2 == 0) **//an even numbered row**

55 {

56 checkerX = checkerX + boxWidth;

57 firstCheckerCol = 2;

58 }

59 g.setColor(Color.RED);

60 **for**(**int** col = firstCheckerCol; col <=8; col= col + 2)

61 { **//red checker locations**

62 checkerX = 20 + (col -1) \* boxWidth;

63 g.fillOval( checkerX, checkerY, 40, 40);

64 }

65 checkerY = checkerY + boxHeight;

66 checkerX = 20;

67 firstCheckerCol = 1;

68 }

69 }

70 }

**Figure 5.11 The graphical application CheckerBoard.**