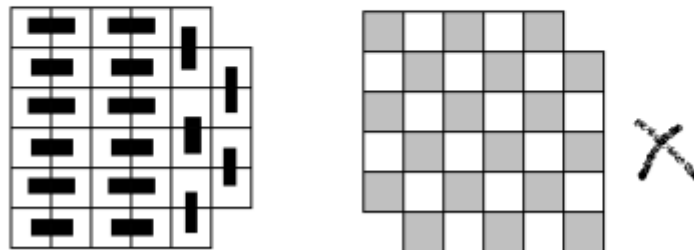
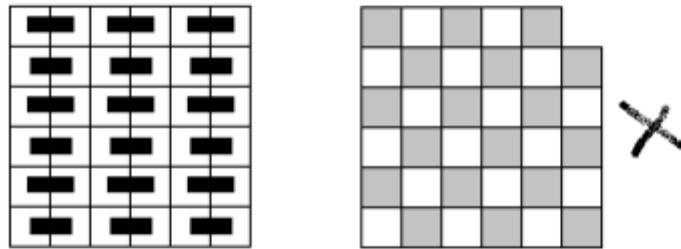
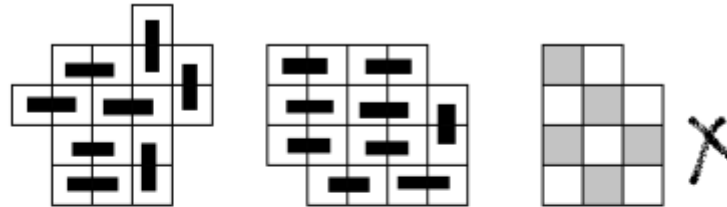


WITHOUT WORDS

Mathematical Puzzles to Confound and Delight



WW 24: SOLUTION



Colour each region black grey and white like a checkerboard. As each domino covers one cell of each color, for a region to be tileable we need, at the very least, an equal number of grey and white cells. The three regions shown have these as unequal counts and so cannot be tiled. (And one verifies that each of the remaining regions can indeed be tiled.)

Challenge: Devise a region in the plane that has an equal number of grey and white cells that still, nonetheless, cannot be tiled with dominos. (This shows that have equal counts of cells of each colour does not ensure tileability.)