

What you need

Felt tip markers, scissors, tape, copy machine

The secret to making an infinite pattern

Have you ever seen a pattern on fabric or wrapping paper that seems to have no beginning or end? Today's lesson reveals the secret to these puzzling patterns. If the spaceships are a bit too challenging, try the process with simple geometric shapes - such as stars, circles, triangles and moons - and your results will be just as successful.

If you have access to a copy machine, you can make your pattern go on and on and on, just like wrapping paper. Once you have completed your original tile, you can make as many copies as you like. They will all fit together.

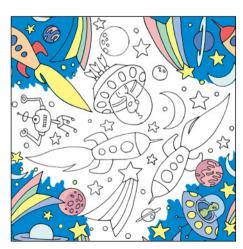
Contact:

Amy Raudenbush Phila. Daily News 801 Market St. Philadelphia, PA 19107

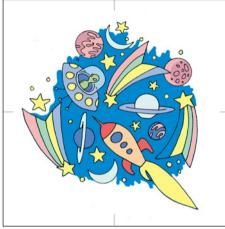
Or email art@phillynews.com.



Start with 4 Post-it notes arranged into a 6-inch square. If you don't have Post-it notes, you can also use a square sheet of paper. Begin to draw your pattern in the middle of the square leaving the edges empty. Don't worry about copying these images exactly; your pattern will work as long as the shapes are gathered in the center and the outside edges of the paper are clear.



Fill the remaining white area with more space objects (or shapes).



Color your objects with your markers. It's hard to color evenly over so many edges of paper, but if you are careful, it will work. Now, begin to color your background. Add color to only the innermost area of the background. Do not extend the background color beyond the objects — you can add it later.

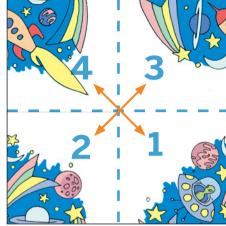


Color the new shapes and extend the background to all of the edges. We will call this a "tile."

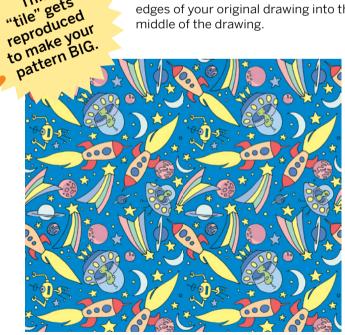


If your drawing is on a square piece of paper and not on Post-it notes, carefully cut your square drawing into four equal quarters.

"tile" gets



Each of the four quarters will now be moved to its kitty-corner position onto a clean sheet of paper. Tape the edges if necessary. You have moved the white area from the edges of your original drawing into the middle of the drawing.



Copy your tile two or more times on a copy machine. Cut them out, fit them together and watch your pattern expand!