

TILING A SQUARE WITH EIGHT CONGRUENT POLYOMINOES

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The problem of finding polyominoes that tile rectangles has attracted a lot of attention; see [1] for an overview, and [2, 3] for more recent results. Several general families of such polyominoes are known, but sporadic examples seem to be scarce. Marshall [2, Fig. 9] gives a polyomino of rectangular order 8, and asks if it can be generalized to a family of rectifiable polyominoes.

Here we show one way to generalize Marshall's construction, which yields an infinite family of polyominoes of rectangular order 8. Marshall's construction is the first square in Figure 1.

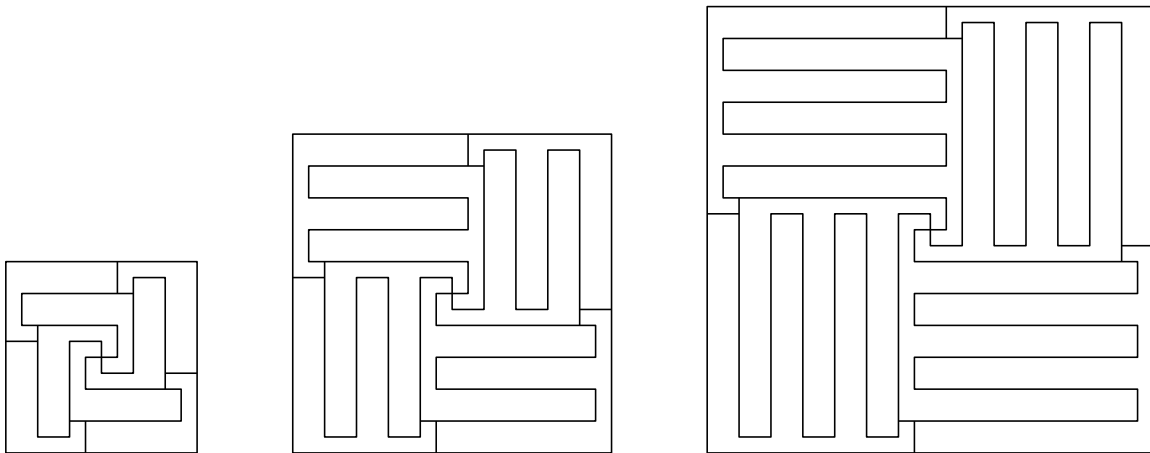


FIGURE 1. Infinite family of polyominoes of rectangular order 8.

REFERENCES

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3. Michael Reid, *Tiling rectangles and half strips with congruent polyominoes*, *Journal of Combinatorial Theory, Series A* **80** (1997), no. 1, 106–123. MR 98i:05046

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