

Define an *n*-triangle to be a triangle with integer coordinates and perimeter in [n, n+1).

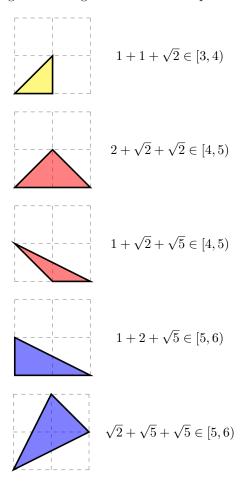


Figure 1: An example in yellow showing that a(3) = 1, and example in red showing that a(4) = 2, and an example in blue showing that a(5) = 3.

Question. Let a(n) count n-triangles up to dihedral action. What is the asymptotic growth of a(n)?

Related.

- 1. How many tetrahedra?
- 2. How many quadrilaterals?

References.

https://oeis.org/A298079 counts the number up to congruence.

Problem 44