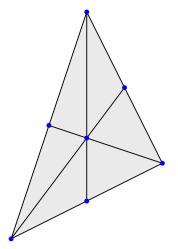
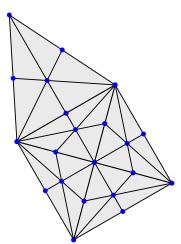
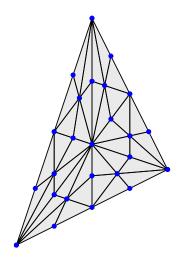
Motivating examples using \subdiv:





Now we use \subdivrec to draw the second barycentric subdivision of a triangle (i. e. the barycentric subdivision of its barycentric subdivision):

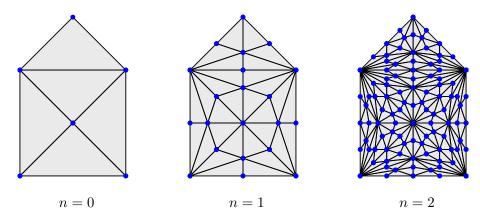


In Germany we have a riddle for children: draw a "Haus vom Nikolaus" (house of St. Nicholas) without lifting the pen from the paper and without drawing any line twice. Mathematically put: find an Eulerian path in the following graph:



(note that there is *not* a graph vertex at the intersection of the two diagonal lines).

Now we put an extra vertex at the crossing in the middle and interpret the figure as a composition of five 2-simplices ("filled triangles"). Then resulting complex in its n-th barycentric subdivision can be drawn via \mathbf{n} -ikolausresidenz{n}:



\nikolausresidenz{3} on the next page:

¹http://de.wikipedia.org/wiki/Haus_vom_Nikolaus

