

The figure shows a circular placement of all domino tiles. If we think of a graph with vertices labeled $0, 1, 2, 3, 4, 5, 6$, we see that each domino tile with two different numbers can be seen as an edge of the complete graph K_7 . A complete graph K_n with n odd is eulerian since all vertices have even degree. An eulerian circuit in K_7 corresponds to a correct placement of the dominos. Each domino with two equal numbers can be placed anywhere the dominos have that same number.