Starting with 1 and working in a hexagonal spiral, repeatedly choose the smallest positive integer such that it won't be adjacent either itself (once) or to the same number twice.

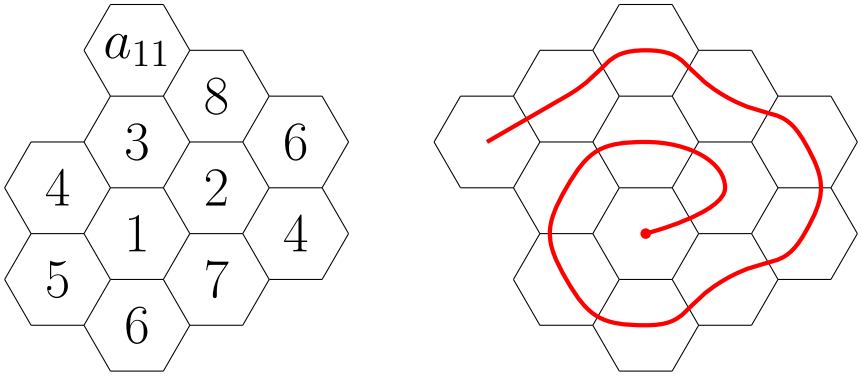

Figure 1: $a_{11} \neq 1$ because 3 is already adjacent to 1, $a_{11} \neq 2$ because 3 and 8 are already adjacent to 2, $a_{11} \neq 3$ because then a_{11} would be equal to its neighbor, $a_{11} \neq 4$ because 3 is already adjacent to 4, thus $a_{11} = 5$.

Figure 2: A plot of a_1 through a_{10000}.

Question. Why does a gap appear in the plot of the sequence?

References.

https://oeis.org/A272573