

Recent progress in cyclic coloring

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(joint work with Roman Soták)

Let G be a connected plane graph. The *cyclic coloring* of G is a vertex coloring in which two vertices must have different colors if they are incident with the same face of G . The problem is to determine the minimum number of colors in such a coloring of G .

In the talk we will present some new upper bounds on this minimum for plane graphs that are subdivision of simple 3-connected plane graphs.