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PROCEDURE DIVISION CONVEX POLYGON TRIANGULATION AND APPLICATION IN COMPUTER GRAPHICS

***Abstract:** In this paper we present the method for convex polygon triangulation. The problem is applied in computer graphics and a method is based on the division (selection of similar) of combination of triangulation. The method of division as the final result provides a combination of internal diagonals of the polygon that do not intersect which represent triangulation of a given polygon. As the key to generate a triangulation for large polygons we use obtained expressions arranged in the form of sums of integers. The described method is characterized by levels and solving small problems to solve bigger problems and therefore may find application in dynamic programming of some algorithms in the computer graphics.*

***Keywords:** Polygon triangulation, Catalan numbers, Computer graphics*