

ENG

*The SAT method, or plane saturation method, generates geographic maps, with interconnected and stochastically frayed countries. Variations on this method have been named SAT tree, Entangled Forest, and Stochastic Labyrinth or LAB method. Therefore, in these methods of Stochastic painting, each polygon is a country on the map crammed between each neighbouring polygon, until they form a tessellation, saturating the plane. Overlapping never occurs here, as it does in the TAN method. In this case, the drawing is performed through the construction of a planar graph with the shape of a tree, a bush, a forest. It involves randomly extracting an ordered succession of points from the plane and connecting each extracted point with the point that is the closest amongst the other extracted ones, using straight line segments. Overlapping is not allowed. If the plane is toroidal, it is likely that the connecting segment will pass outside of the drawing. The random points of the graph are vertexes, the segments connecting them are edges, the first vertex is the root of a tree and of a bush (Lombardo, 1986). The countries derived from the construction of the graph can be coloured by using different methods. The Four Colours Theory represents the starting point for colouring stochastic maps; according to the theory, it is always possible to colour a geographic map, even though a very complex one, with four colours only, distributed in such a way that neighbouring countries will never have the same colour. The minimum number of colours required for colouring a geographic map is called chromatic number. Stochastic Painting is not abstract painting, it does not aim to show the beauty of mathematical harmonies, nor derives from the artist's inspiration. It draws on hyper-ambiguous stimuli, realised through a mathematical program and construed in order to rouse an interactive reaction in the viewer. As Lombardo himself wrote in 1984, technical ability has been replaced by the execution of a task that is not qualitatively relevant; fantasy has been replaced by the logical use of given elements; contemplation has been replaced by situations and problems of choice; the object has been replaced by actions and behaviours.*

Dionigi Mattia Gagliardi

- Lombardo S., (1984) *Arte come scienza. Una barriera di pregiudizi*, Rivista di Psicologia dell'Arte nn. 10/11, Edizioni Jartrakor Roma

- Lombardo S., (1986) *Pittura Stocastica. Introduzione al metodo TAN e al metodo SAT*, Rivista di Psicologia dell'Arte nn. 12/13, Edizioni Jartrakor Roma