

UNIVERSIDADE FEDERAL DE SÃO CARLOS
DEPARTAMENTO DE MATEMÁTICA

COLÓQUIOS DO DM-UFSCAR

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Falará sobre

An Evolver program for weighted Steiner trees

We present an algorithm to find nearly-optimal weighted Steiner minimal trees in the plane. Our algorithm reproduces the physical experiment of a soap film detaching from connected pins towards a stable configuration. The algorithm is implemented in Evolver programming language, which already contains many built-in energy minimisation routines. Some are invoked in the program, which enable it to consist of only 144 lines of source code. In the non-weighted case comparisons with GeoSteiner are drawn for terminals that form a pattern. This joint work with H. Botelho and F. Zampirolli.

Data: 23 de outubro de 2019
Horário: 16h
Local: Auditório do DM