In this work five exact algorithms for the maximum clique problem (MC) were modified with Lexicographic Breadth-first Search (LexBFS) algorithm. Also, Experimental Analysis of Algorithms and hypothesis test were used to evaluate the changes.

1. Study branch and bound algorithms that use vertex coloring to solve MC modified with the LexBFS algorithm.
2. Apply Experimental Analysis of Algorithms.
3. Apply Statistical Inference Theory.

Comparison of the search space evaluated by two algorithms and their respective modifications. For each vertex set size there is a sample size of 10.

References