



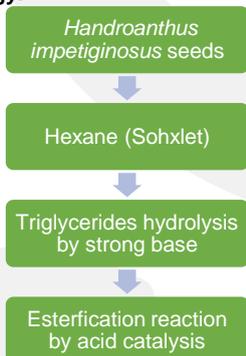
Production of fatty acids and fatty acid methyl esters from hexanic extract of *Handroanthus impetiginosus* (Bignoniaceae) seeds

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1.Introduction: The interest in bioactive compounds from plants has increased due to their diverse antioxidant properties. Species of the *Handroanthus* genus are widely explored, as well as other members of the Bignoniaceae family, for having several medicinal properties. Trees are recognized for pharmacologically active compounds, which are candidates to treat various diseases [1].

2.Methodology:



3.Results and discussion: The yields of hexane extract (EH), fatty acids (FA) and fatty acid methyl esters (FAMEs) from *H. impetiginosus* seeds are shown in table 1.

Table 1: Yield of hexane extract, fatty acids and fatty acid methyl esters from seeds of *Handroanthus impetiginosus*.

Sample	Weight (g)	Yield (%)
HE	654.86	20.47
FA	2.25	44.95
FAMEs	1.68	33.65

There are reports about these reactions using the same methodology, with yields of 34.06% and 41.76% for fatty acids and methyl esters, respectively, for green fruits of

Solanum lycocarpum [3]. Thus, even with the use of a similar methodology, the yields of FA and FAMEs are different, and that can be explained by the composition of the hexane extract of each plant species. Samples can be altered by the presence of unsaturations, modifying the polarity and solubility [4].

4.Conclusion: It is possible to obtain fatty acids and fatty acid methyl esters from hexane extract of *H. impetiginosus* seeds. The results suggest further investigations aimed at evaluating the biological activities of these compounds.

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