



Hypoglycemic potential of *Bauhinia variegata* L. "pata de vaca" as a phytotherapeutic treatment for diabetes Mellitus in an Amazon community

Potencial hipoglicêmico da *Bauhinia variegata* L. "pata de vaca" como tratamento fitoterápico para diabetes mellitus em uma comunidade amazônica

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1 INTRODUCTION

Medicinal plants have stood out in several regions of Brazil revealing their importance as a subsidy for the promotion of health in various locations giving relevance to traditional communities that hold knowledge about the use of medicinal plant species (FRANCO; LAMANO-FERREIRA; FERREIRA, 2011).

The exercise of folk medicine in the Brazilian environment highlights the different knowledge built over time by traditional communities, which are exercised by people who have empirical knowledge, the result of their experiences and experiences passed on to their descendants in a transgenerational oral way (PEREIRA; CUNHA, 2015).

There is a need to integrate scientific and traditional knowledge to consolidate plant conservation practices (OLIVEIRA, 2010), in addition to investment in ethnobiological studies that recognize the importance of traditional knowledge that is perpetuated in different communities (ALBUQUERQUE, 2002).

2 OBJECTIVE

Analyze the use of *Bauhinia variegata* and *Achyrocline satureioides*, which are *medicinal plants* with phytotherapeutic potential, in the treatment of *Diabetes mellitus* used in an Agrovila of the municipality of Castanhal, northeast of Pará.



3 METHODOLOGY

The research was carried out in a descriptive qualitative methodological approach, through field research, using *Respondent Driven Sampling* (RDS), interview, audio recording, collection of species for identification and the collection of scientific information on the medicinal species studied in international databases (*online*).

4 DEVELOPMENT

The results reveal that *Bauhinia variegata* L. ("pata de vaca") is widely used in the surveyed Agrovillage mainly for diabetes. The leaf extract of *B. variegata* L. has antidiabetic activity for both Type I and Type II diabetes. The leaf extract has antidiabetic activity in both Type I and Type II diabetes (GURJAR, 2018).

The studies by Tripathi, Gupta and Singh (2019), show that the flower extract of *Bauhinia variegata* L. resulted in significant reduction in blood glucose level, cholesterol, triglycerides and free radical level. This affirms the importance of this medicinal vegetable in combating *Diabetes mellitus*. According to Shahana, and Nikalje (2017, p. 186), "*Bauhinia variegata* L. can be considered as a model herbal drug for experimental studies including free radical induced disorders like cancer, diabetes, atherosclerosis, etc."

5 FINAL CONSIDERATIONS

The uses of *Bauhinia variegata* L. in Macapazinho are based on the knowledge passed down between generations. The indications of uses found in the scientific literature corroborate with the uses in the community that uses the stem in the phytotherapeutic preparation. The relevance of this plant species is due to the presence of chemical compounds, such as flavonoids and reducing sugars. In addition, this medicinal plant is promising and offers a low-cost alternative for use by traditional populations. It is also important to emphasize that the systematic application of precision and accuracy tests with *Bauhinia variegata* L. may ensure validation as a herbal medicine in the near future as recommended by the National Health Surveillance Agency (ANVISA).



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