Evaluation the effect of *Baccharis trimera* on parameters of oxidative stress of streptozotocin-induced diabetic rats

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Antioxidant therapy has been used worldwide, aiming to reduce oxidative stress and the complications of diseases like diabetes. *Baccharis trimera*, commonly known in Brazil as carqueja, is a medicinal plant known by its antioxidants properties and it’s used in popular cultures like antidiabetic. The aim of this study was to evaluate the antioxidant potential of a seven-day treatment with an extract of *Baccharis trimera* in streptozotocin-induced diabetic rats. The antioxidant effects were evaluated by quantifying the levels of thiobarbituric acid reactive substances (TBARS), protein carbonylation, and the activity of catalase and superoxide dismutase (SOD). All assays were measured in liver of 38 male fisher rats distributed in 4 groups (control - C, non diabetic treated - NDt, diabetic - D, diabetic treated - Dt). The results were statistical analyzed by Student’s “t” test. P values less than 0.05 were considered significant. Any of the assays realized showed statistical difference between groups, except for the activity of catalase that presented lower levels in treated groups. Catalase activity were significantly lower Dt group (588.1 ± 51.0 µmol/ml) comparing to D group (730.3 ± 80.5 µmol/ml), and in NDt group (816 ± 64 µmol/ml) comparing to C group (940 ± 146.8 µmol/ml). Our study concluded that the seven-day treatment with the extract of *Baccharis trimera* in male rats is not efficient in the reduction of oxidative stress, and we suggest that more studies should be realized in different experimental models.

Word Keys: Antioxidants; *Baccharis trimera*; diabetes.
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