



## Cognitive and Anti Oxidant Property of *Mimusops elengi* Linn. in the Experimental Model of Alzhiemer's Disease in Rats

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**Abstract: Objective:** *Mimusops elengi* Linn, is one such important medicinal plant whose bark, leaves and flowers have proved to have several pharmacological properties. In the present study, hydroalcoholic extract of flowers is used to study the protective role in Alzhiemer's disease.

**Materials and Methods:** Rats were divided into 5 groups and treated with Colchicine (15µg/rat) through Intracerebroventricular route(I.C.V). *Mimusops elengi* flower extract(ME) was administered at doses of 100 and 200mg/kg(p.o route) once a day for 28 days. The standard group recives Donepezil(1mg/kg,p.o) and the *Invivo* pharmacological tests and biochemical assessments were made on 7<sup>th</sup>, 14<sup>th</sup> and 28<sup>th</sup> day of administration.

**Results:** ME significantly (P<0.05, P<0.01) improved the behavioural paramenetrs in *Invivo* pharmacological tests, Acetylcholinestearase levels and antioxidant in a dose dependent manner and significanmtly(P<0.05) reduced MDA levels.

**Conclusion:** ME possesse significant antioxidant activity and shows neuroprotection in Alzhiemer's disease.

**Key Words:** Alzhiemer's disease, *Mimusops elengi* Linn., Colchicine.