Inhibitory effect of ethyl acetate extract from *Kielmeyera neglecta* leaves on murine glioblastoma cells.

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The secondary metabolites of plants are good source for development of new therapeutic agents. Glioblastomas are malignant and rapidly proliferating tumors and present poor prognosis. This study evaluated the properties of an ethyl acetate extract obtained from leaves (EAKNL) of *Kielmeyera neglecta* (Clusiaceae) to inhibit the growth of glioblastoma cells. EAKNL extract was obtained from 1.5 Kg of leaves *Kielmeyera neglecta* from plants growing in the coastal sandy soils (restinga) along the coast of Bahia State, northeast Brazil. Murine glioblastoma cells (C6) were cultures in DMEM supplemented medium and treated for 72 h with ethyl acetate extracts at concentrations ranging from 5 µg/mL and 200 µg/mL and the growth and cell viability was determined by MTT. We observed that EAKNL induced a dose dependant growth inhibition of glioblastoma cells with an IC50 of 75 mg/mL. Morphological changes were also observed in remaining adherent cells in cultures exposed to 100-200 µg/mL EAKNL suggesting alterations on cell physiology. These findings indicate that ethyl acetate extract from *K. neglecta* have inhibitory molecules that will be purified and investigated as potential drugs for glioblastoma treatment.

Key words: Glioblastoma, Inhibitory, *Kielmeyera neglecta*

Supported by CNPq and FAPESB.