



Cytotoxicity evaluation of *Launaea procumbens* on two cell lines

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Background and objectives: *Launaea procumbens* is a member of Asteraceae family which can be found in the south part of Iran especially the province of Hormozgan. This plant has got a variety of usage in traditional medicine for curing the skin diseases. In this study, we have investigated the cytotoxic effect of its various extracts at concentrations bracketing the minimum antibacterial concentration that has been found in a previous study to be 450 ug/mL. **Methods:** Total methanol extract was prepared with the standard method of maceration. Different fractions were prepared by liquid-liquid fractionation. The extracts were then dried with rotary evaporator. The dried concentrated extracts were kept within glass vials under standard conditions until used. Hep-2c and VERO cell lines were used in MTT test. A range of concentrations (10-500 ug/mL) of the extracts were prepared and were added to about 70% confluent 96 well plates. After exposure for 48 h, MTT solution was added to the wells, and 4 h later formazan crystals were solubilized and optical densities were read at 570 nm. **Results:** The MTT results indicated that total methanol extract and methanol and petroleum ether fractions of this plant showed acceptable safety at concentrations that were already shown to be bactericidal. **Conclusion:** According to the results *L. procumbens* extract and fractions can be used at concentrations up to 500 ug/mL.

Keywords: cytotoxicity, *Launaea procumbens*, MTT
