PENGARUH EKSTRAK KENCUR (Kaempferia galanga) TERHADAP PROSES ANGIOGENESIS PASCA PENCABUTAN GIGI TIKUS WISTAR

THE EFFECT OF KENCUR'S EXTRACT (Kaempferia galanga) TO ANGIOGENESIS PROCES ON POST EXTRACTION WOUND RATTUS NORVEGICUS

ABSTRACT

Background: Tooth extraction is the most common treatment in dentistry. There are many complication in post extraction wound. The process of wound healing is a cellular process which restores the integrity of the tissue. Structure tissue in wound healing requires a supply of oxygen and nutrients in order to proliferate well. Angiogenesis is the new blood vessels formation normality and important on growth and development of individu. Kencur is one herb that is often used in the treatment of inflammation. Purposes: The aims of this study were studying endothelial cell on angionesis procces during post extrection wound healing using kencur (Kaempferia galanga) ekxtract in rats. Methods: This research used 32 Wistar rats divided into 2 groups, control group and treated group. Treated group was devided into 3 group based on concentration of kencur extract. Group 1 treated by 3% kencur gel extract, group 2 treated by 5% kencur gel extract, group 3 treated by 7% kencur gel extract. The rats were sacrified at 3 days after extraction. The endothelial cells were showed by counted amount of endothelial cell layers from HPA preparations mandibular biopsy result. Result: Among treated group, concentration 7% kencur's gel increase amount of endothelial cell compared other concentration. Conclusion: increasing the number of endothelial cell was directly proportional to the increasing consentration of the extract gel kencur.

Keyword: kencur, kaempferia galanga, endothelial cell, post-extraction wound