

ABSTRAK

Tenggara, Alamsyah. 2016. *Efek Ekstrak Daun Sirsak (Annona muricata L.) terhadap Skor Epitel Lambung Tikus Rattus novergicus yang Diinduksi Indometasin*. Tugas Akhir, Program Studi Kedokteran Fakultas Kedokteran Universitas Brawijaya. Pembimbing : (1) Dr. dr. Umi Kalsum, M.Kes. (2) Dr.dr. Endang Sri Wahyuni, MS.

Banyak jenis obat-obat *Non Steroid Antiinflammatory Drugs* (NSAIDs) non selektif seperti indometasin yang masih beredar, diresepkan dan dijual bebas di masyarakat umum. Berakibat rusaknya mukosa lambung yang berawal dari ketidakseimbangan antara faktor agresif dan defensif. Zat *Annonaceous acetogenins* dan *flavonoid* yang dikandung ekstrak daun sirsak (*Annona muricata*) diduga bermanfaat sebagai gastroprotektif, antiinflamasi, antioksidan dan lain-lain. Oleh karena itu dilakukan penelitian ekperimental menggunakan *the post test control group design* kepada 25 ekor tikus *Rattus novergicus* strain wistar jantan untuk mengetahui hasil terhadap pengurangan lesi integritas epitel lambung. Terdapat 5 kelompok tikus yang dibagi menggunakan *simple random sampling*, yaitu kontrol positif, kontrol negatif, perlakuan dosis 1, perlakuan dosis 2, dan perlakuan dosis 3. Pada penelitian ini didapatkan hasil terdistribusi normal menggunakan Uji *Kolmogorov-Smirnov Test* dengan nilai $p > 0,05$. Pada Uji ANOVA didapatkan perbedaan yang signifikan $p = 0.000$ (signifikan jika $p < 0,05$) terhadap lesi integritas epitel lambung. Untuk *Pos Hoc Tukey* menunjukkan bahwa ada perbedaan signifikan pada skor integritas epitel mukosa antar 3 kelompok kecuali antara kontrol positif dengan perlakuan dosis 1. Hasil uji *Korelasi Pearson* memiliki data korelasi negatif yang sangat kuat (nilai $r = -0,966$) sehingga semakin tinggi dosis ekstrak daun sirsak yang diberikan semakin sedikit kerusakan sel epitel mukosa lambung. Uji regresi linier menunjukkan 93,4% dipengaruhi oleh variabel independen (ekstrak daun sirsak) terhadap variabel dependen (skor integritas epitel mukosa lambung) dibandingkan pengaruh faktor eksternal. Disimpulkan ekstrak daun sirsak dapat mengurangi lesi integritas epitel lambung.

Kata Kunci : lambung, tikus, daun sirsak, epitel

ABSTRACT

Tenggara, Alamsyah. 2016. The Effect of Soursop Leaves Extract (*Annona muricata L.*) toward Gastric Epithel Score in Rats *Rattus norvegicus* Strain Wistar That Induced by Indomethacin. Final Assignment, Faculty of Medicine, Brawijaya University. Supervisors : (1) Dr. dr. Umi Kalsum, M.Kes. (2) Dr.dr. Endang Sri Wahyuni, MS.

Many kind of non-selective *Non Steroid Antiinflammatory Drugs* (NSAIDs), such as indomethacin that still distributed, prescribed and sold freely in society. Causing damage to gastric mucosal barrier that begin from the unbalance between aggressive and defensive factor. Substances of soursop leaf extract (*Annona muricata*) contain *Annonaceous acetogenins* and *flavonoid* is suspected to be useful as gastroprotective, antiinflammatory, antioxidant and others. Therefore, experimental research carried out using *the posttest control group* design to 25 rats *Rattus norvegicus* male Wistar strain to determine the result of the reduction in gastric epithel integrity lesion. There are five groups of rats that were divided using *simple random sampling*, the positive control, negative control, treatment dose 1, dose treatment 2, and 3 dose treatment. In this study, the results are normally distributed using the *Kolmogorov - Smirnov Test* with $p > 0.05$. In ANOVA found a significant difference $p = 0.000$ (significant if $p < 0.05$) to score the integrity of the epithelial cells of the gastric mucosa. To *post hoc Tukey* shows that there are significant differences in the mucosal epithelial integrity scores among the 3 groups except the positive control dose treatment 1. The *Pearson correlation test* results have data very strong negative correlation ($r = -0.966$) so that the higher the dose of soursop leaf extract were given the less damage the epithelial cells of the gastric mucosa. *Linear regression test* showed 93.4 % are influenced by independent variables (soursop leaf extract) on the dependent variable (gastric mucosal epithelial integrity score) compared to the influence of external factors. Concluded soursop leaf extract can reduce the gastic epithel integrity lesions.

Keywords : gaster, rat, soursop leaves, epithel