**UJI AKTIVITAS ANTIBAKTERI AIR PERASAN BUAH JERUK PURUT (*Citrus hystrix* DC.) TERHADAP PERTUMBUHAN BAKTERI *Staphylococcus aureus* dan *Escherichia coli***

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# ABSTRAK

Jeruk purut (*Citrus hystrix* DC.) merupakan salah satu jenis tumbuhan yang banyak dimanfaatkan untuk pengobatan, Antara lain sebagai antibakteri. Sebagian besar penyakit infeksi disebabkan bakteri *Staphylococcus aureus* dan *Escherichia coli.* Tujuan penelitian ini adalah Untuk mengetahui aktivitas antibakteri air perasan jeruk purut (*Citrus hystrix* DC.) terhadap bakteri *Escerichia coli* dan *Staphylococcus aureus.*

Metode yang digunakan pada penelitian ini eksperimental dengan rancangan penelitian meliputi pengumpulan dan pengolahan sampel, pembuatan sari buah jeruk purut, skrining fitokimia, pengujian aktivitas antibakteri air perasan buah jeruk purut dengan metode difusi agar.

Hasil pengujian skrining fitokimia sari buah Jeruk purut (*Citrus hystrix* DC.) positif mengandung flavonoid, saponin, steroid, dan triterpenoid. Pengujian aktivitas antibakteri sari buah Jeruk purut (*Citrus hystrix* DC.) dilakukan pada konsentrasi10%, 25%, 50%, 75% dan 100%. Pada bakteri *Escerichia coli* di dapat hasil zona hambat berturut-turut 6.10, 6.23, 6.63, 14.80 dan 20 mm. pada bakteri *Staphylococcus aureus* di dapat hasil zona hambat berturut-turut 6.43, 6.80, 8.41, 13.76 dan 20.96 mm. Kesimpulan air perasan jeruk purut (*Citrus histrix* DC.), lebih efektif terhadap bakteri gram positif (*Staphylococcus aureus)* di bandingkan dengan bakteri gram negatife (*Escherichia Coli).*

**Kata kunci**: Antibakteri, *Escherichia Coli,* Air perasan Jeruk purut (*Citrus hystrix* DC.), *Staphylococcus aureus*

***ANTIBACTERIAL ACTIVITY TEST OF KAFFIR LIME JUICE (Citrus hystrixDC.) ON THE GROWTH OF THE BACTERIA OF***

***Staphylococcus aureus AND Escherichia coli***

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***ABSTRACT***

*Kaffir Lime (Citrus hystrixDC.) was one type of plant that was widely used for treatment, including as an antibacterial. Most infectious diseases were caused by Staphylococcus aureus and Escherichia coli bacteria. The objective of the research was to determine the antibacterial activity of kaffir lime juice (Citrus hystrixDC.) against Escerichia coli and Staphylococcus aureus bacteria. The method used in this research was experimental with a research design including sample collection and processing, making kaffir lime juice, phytochemical screening, testing the antibacterial activity of kaffir lime juice by diffusion method. The results of the phytochemical screening test for kaffir lime juice (Citrus hystrixDC.) were positive for flavonoids, saponins, steroids, and triterpenoids. The antibacterial activity of kaffir lime juice (Citrus hystrixDC.) was tested at concentrations of 10%, 25%, 50%, 75% and 100%. In Escerichia coli, the inhibition zones were 6.10, 6.23, 6.63, 14.80 and 20 mm, respectively. on Staphylococcus aureus bacteria, the inhibitory zone results were 6.43, 6.80, 8.41, 13.76 and 20.96 mm, respectively. In conclusion kaffir lime juice (Citrus histrixDC.), was more effective against gram-positive bacteria (Staphylococcus aureus) than gram-negative bacteria (Escherichia Coli).*

***Keywords:*** *Antibacterial, Escherichia Coli, Kaffir Lime juice (Citrus hystrixDC.), Staphylococcus aureus*