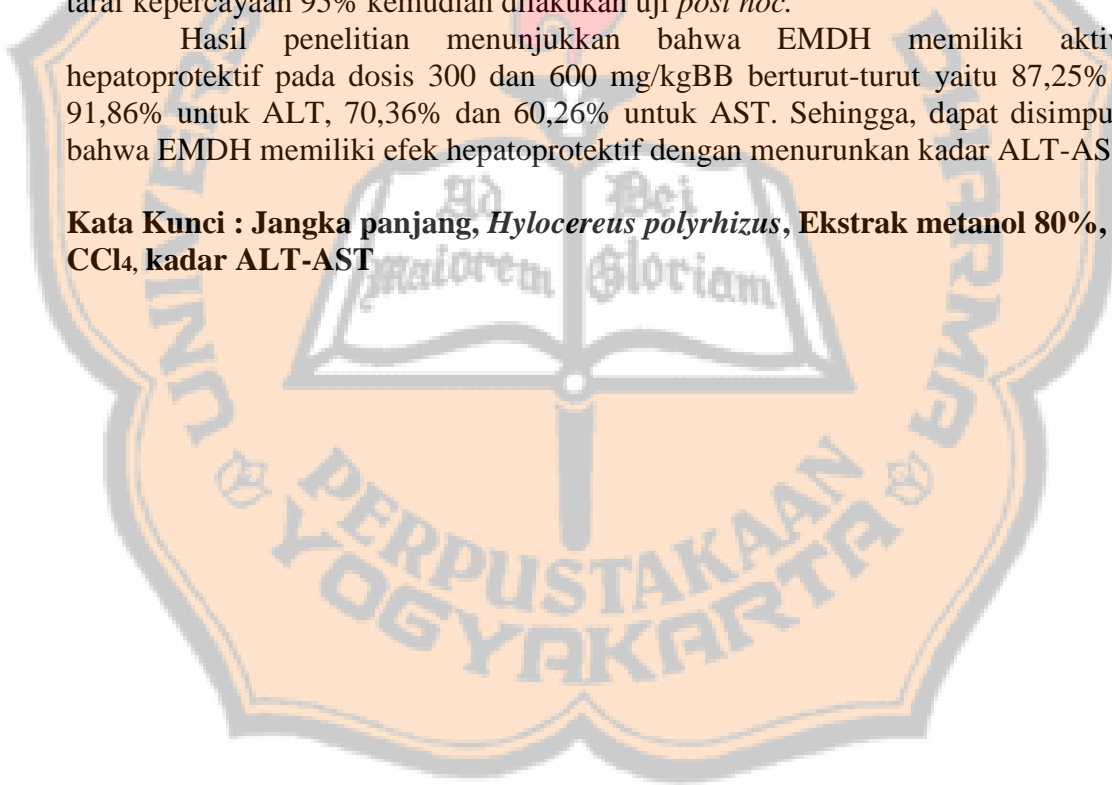


ABSTRAK

Penelitian ini bertujuan untuk membuktikan efek hepatoprotektif ekstrak metanol 80% daging *Hylocereus polyrhizus* (EMDH) secara jangka panjang pada tikus jantan galur Wistar terinduksi CCl₄. Penelitian eksperimental murni dengan rancangan acak lengkap pola searah ini menggunakan 30 tikus jantan galur Wistar yang dibagi acak ke dalam 6 kelompok. Kelompok I (kontrol hepatotoksik) diberi CCl₄ dosis 2,0 mL/kgBB secara intraperitoneal (i.p). Kelompok II (kontrol negatif) diberi CMC-Na 1% secara peroral (p.o). Kelompok III (kontrol ekstrak) diberi dosis tertinggi EMDH yaitu 600 mg/kgBB secara p.o. Kelompok IV-VI diberi EMDH dosis 150, 300 dan 600 mg/kgBB secara p.o. selama enam hari berturut-turut dan pada hari ke tujuh diberi CCl₄ 2,0 mL/kgBB secara i.p. Pengambilan darah dilakukan melalui *sinus orbitalis* mata pada jam ke-24 untuk diukur kadar ALT-AST. Data ALT-AST dianalisis menggunakan uji *Shapiro-Wilk*, dilanjutkan uji *Kruskal Wallis* atau *One Way Anova* taraf kepercayaan 95% kemudian dilakukan uji *post hoc*.

Hasil penelitian menunjukkan bahwa EMDH memiliki aktivitas hepatoprotektif pada dosis 300 dan 600 mg/kgBB berturut-turut yaitu 87,25% dan 91,86% untuk ALT, 70,36% dan 60,26% untuk AST. Sehingga, dapat disimpulkan bahwa EMDH memiliki efek hepatoprotektif dengan menurunkan kadar ALT-AST.

Kata Kunci : Jangka panjang, *Hylocereus polyrhizus*, Ekstrak metanol 80%, CCl₄, kadar ALT-AST



ABSTRACT

The purpose of this research was to investigate the hepatoprotective effect of long term 80% methanolic extract of *Hylocereus polyrhizus* pulp in male Wistar rats induced by CCl₄. This research was purely experimental research with randomized complete direct sampling design. This research used 30 male Wistar rats divided randomly into 6 groups. Group I (hepatotoxin control) was given CCl₄ dose 2 mL/kgBW intraperitoneally. Group II (negative control) was given 1% CMC-Na orally. Group III (extract control) was given the highest dose of 80% methanolic extract of *Hylocereus polyrhizus* orally. Group IV-VI (treatment groups) were given extract once a day for six days with a dose started from 150, 300 and 600 mg/kgBW, and then in 7th day the group induced by CCl₄ 2 mL/kgBW intraperitoneally. At the 24th hours after administrated of CCl₄, ALT-AST level were examined in all treatment groups. ALT-AST level were analysed using *Shapiro-Wilk* test, *Kruskal Wallis* test or *One Way Anova* with 95% significancy level and continued with post hoc test.

The result of study shown that 80% methanolic extract of *Hylocereus polyrhizus* pulp has a hepatoprotective effect at dose 300 and 600 mg/kgBW, respectively were 87.25% and 91.86% for ALT; 70.36% and 60.26% for AST. Based on the research, it can be concluded that 80% methanolic extract of *Hylocereus polyrhizus* pulp has a hepatoprotective effect by lowering ALT-AST level.

Keywords: Long term period, *Hylocereus polyrhizus*, 80% methanolic extract, CCl₄, ALT-AST level