ABSTRAK

Lia Dea Komala, 2023, FORMULASI TABLET *EFFERVESCENT* PARASETAMOL DENGAN KOMBINASI VARIASI PVP DAN MANITOL TERHADAP MUTU FISIK DAN TANGGAPAN RASA, PROPOSAL SKRIPSI, FAKULTAS FARMASI UNIVERSITAS SETIA BUDI, SURAKARTA.

Tablet *effervescent* dikembangkan untuk mengatasi masalah ketidakpatuhan pengobatan. Obat-obatan oral dalam bentuk *effervescent* banyak diminati konsumen. Tujuan dari penelitian ini untuk mengetahui pengaruh kombinasi PVP dan manitol dalam pembuatan tablet *effervescent* parasetamol terhadap mutu fisik, stabilitas dan tanggapan rasa, serta untuk mengetahui formula kombinasi PVP dan manitol yang memberikan mutu fisik dan tanggapan rasa yang paling baik.

Penelitian ini termasuk dalam eksperimental dengan pembuatan tablet *effervescent* parasetamol menggunakan metode granulasi kering serta memvariasikan konsentrasi PVP dan manitol dalam empat formula, PVP dalam range 0,5-3,5% dan manitol dengan konsentrasi 26,6-29,6%. Dilakukan pengujian terhadap garnul dan tablet *effervescent* parasetamol meliputi uji organoleptis, keseragaman bobot, kerapuhan tablet, kekerasan tablet, waktu larut tablet, pH, dan tanggapan rasa responden serta uji stabilitas selama 28 hari pada suhu ruang. Hasil data dianalisis dengan menggunakan metode *one way* ANOVA.

Hasil pengujian granul dari formula I sampai formula IV memenuhi persyaratan setelah di uji statistic nilai sig >0,05, dengan konsentrasi PVP dan manitol dapat mempengaruhi uji mutu fisik tablet sebelum dan setelah dilakukan stabilitas. PVP dan manitol mempengaruhi kekerasan pada formula I berbeda signifikan pada formula III dan formula IV nilai sig < 0,05, sedangkan pada formula II tidak berbeda signifikan pada formula I nilai sig > 0,05, serta waktu larut tablet pada formula I, formula II, formula III, formula IV dan tanggapan rasa memenuhi syarat. Dilakukan uji responden tanggapan rasa dengan formula IV yang terbaik.

Kata Kunci: Tablet *effervescent*, PVP, Manitol.

ABSTRACT

Lia Dea Komala, 2023 FORMULATION OF EFFERVESCENT PARACETAMOL TABLETS WITH A COMBINATION OF PVP AND MANNITOL VARIATIONS ON PHYSICAL QUALITY AND TASTE RESPONSES, THESIS PROPOSAL, FACULTY OF PHARMACY, SETIA BUDI UNIVERSITY, SURAKARTA.

Effervescent tablets were developed to address the problem of medication non-adherence. In recent times, oral drugs in effervescent form are in great demand among consumers due to their ease of use and attractive taste. The purpose of this study was to determine the effect of the combination of PVP and mannitol in the manufacture of paracetamol effervescent tablets on physical quality, stability and taste responses, as well as to determine the combination formula of PVP and mannitol that provides the best physical quality and taste response.

This study was included in the experiment with the manufacture of paracetamol effervescent tablets using the dry granulation method and varying the concentration of PVP and mannitol in four formulas, PVP in the range of 0.5-3.5% and mannitol with a concentration of 26.6-29.6%. Tests were carried out on paracetamol garnul and effervescent tablets including organoleptis tests, weight uniformity, tablet brittleness, tablet hardness, tablet dissolution time, pH, and taste responses of respondents as well as stability tests for 28 days at room temperature. The data results were analyzed using the one way ANOVA method.

The results of granule testing from formula I to formula IV meet the requirements after statistical tests sig value >0.05, with PVP and mannitol concentrations can affect the physical quality test of tablets before and after stability. PVP and mannitol affect hardness in formula I significantly different in formula III and formula IV sig value < 0.05, while in formula II not significantly different in formula I sig value > 0.05, and tablet dissolution time in formula I, formula II, formula III, formula IV and taste responses qualified. Respondents tested taste responses with the best formula IV.

Keywords: Effervescent tablets, PVP, Mannitol.