

**Perbandingan Tablet Ramipril Metode Kempa Langsung Hasil
Modifikasi Dispersi Padat, *Solid Self Nanoemulsifying*, dan Dibuat
*Fast Dissolving Tablet***

(Studi Literatur)

SKRIPSI

SIFA ULFASARI

NIM 31116139



PROGRAM STUDI FARMASI

**SEKOLAH TINGGI ILMU KESEHATAN BAKTI TUNAS HUSADA
TASIKMALAYA**

2020

ABSTRAK

Teknologi pembuatan tablet yang paling revolusioner adalah teknologi kempa langsung karena lebih bersifat ekonomis serta kemudahan saat pembuatan. Namun, tidak semua obat dapat dibuat tablet dengan metode kempa langsung karena memiliki daya alir, kompresibilitas, dan bioavailabilitas yang kurang baik. Ramipril merupakan obat antihipertensi golongan ACE-I (*Angiotensin Converting Enzyme Inhibitor*). Ramipril termasuk *Biopharmaceutics Classification System* (BCS) kelas II dengan bioavailabilitas sekitar 28%. Sudi literatur ini bertujuan untuk mengetahui evaluasi tablet ramipril setelah dilakukan modifikasi dispersi padat, *solid selfnanoemulsifying*, dan *fast dissolving tablet*. Serta membandingkan pengaruh modifikasi dispersi padat, *solid-selfnanoemulsifying*, dan *fast dissolving tablet* terhadap laju disolusi tablet ramipril.

Kata kunci: daya alir, kompresibilitas, bioavailabilitas, *Biopharmaceutics Classification System* (BCS).

ABSTRACT

The most revolutionary tablet-making technology is direct compression technology because it is more economical and easy to manufacture. However, not all drugs can be made tablets with direct compression method because it has a poor flow of powder, compressibility, and bioavailability. Ramipril is an antihypertensive drug class of ACE-I (Angiotensin Converting Enzyme Inhibitor). Ramipril is a Class II of Biopharmaceutics Classification System (BCS) with bioavailability 28%. This literature study aims to determine the evaluation of ramipril tablets after modifications of solid dispersion, solid self nano emulsifying, and fast dissolving tablet. As well as comparing the effects of modifications of solid dispersion, solid self nano emulsifying, and fast dissolving tablet on the dissolution rate of ramipril tablets.

Keywords: *flow powder, compressibility, bioavailability, Biopharmaceutics Classification System (BCS).*