

KAJIAN INTERAKSI OBAT ANTIDIABETES DENGAN ANTIHIPERTENSI DI RUMAH SAKIT PANTI RAPIH

Wida Norliani¹, Novia Ariani Dewi², Siwi Padmasari²

INTISARI

Latar Belakang: Diabetes melitus tipe 2 dan hipertensi sering terjadi bersamaan yang diakibatkan adanya resistensi insulin dan hiperinsulinemia sehingga menyebabkan terjadinya resistensi perifer yang dapat meningkatkan tekanan darah. Kondisi tersebut menyebabkan adanya potensi interaksi obat. Interaksi antara antidiabetik dan antihipertensi dapat memengaruhi efektivitas maupun keamanan terapi, seperti risiko hipoglikemia sehingga dapat memperburuk kondisi pasien.

Tujuan Penelitian: Mengetahui kajian interaksi obat antidiabetes dengan antihipertensi di Rumah Sakit Panti Rapih

Metode Penelitian: Penelitian ini merupakan studi deskriptif observasional dengan pendekatan retrospektif, yang dilakukan di bagian rekam medis RS Panti Rapih pada Juni 2025. Sampel penelitian yang memenuhi kriteria inklusi dan eksklusi sebanyak 98 pasien. Data dianalisis menggunakan analisis univariat menggunakan *microsoft excell* untuk menggambarkan karakteristik pasien (usia, jenis kelamin, penyakit penyerta), profil pengobatan (nama, golongan obat antidiabetes dan antihipertensi), potensi dan tingkat keparahan interaksi obat (*minor, moderate, mayor, dan unknown*), serta mekanisme interaksi (farmakokinetik dan farmakodinamik) yang disajikan dengan tabel persentase, data yang diperoleh dianalisis menggunakan *drugs.com* dan *medscape*.

Hasil Penelitian: Mayoritas pasien berusia di atas 60 tahun (72,45%), berjenis kelamin perempuan sebanyak (66,33%), dan memiliki penyakit penyerta sebanyak (89,80%). Antidiabetik yang paling banyak digunakan adalah metformin sebanyak (27,67%), sedangkan obat antihipertensi adalah candesartan sebanyak (17,69%). Mayoritas pasien pada penelitian ini mengalami potensi interaksi obat yaitu sebanyak (84,69%) yaitu dengan tingkat keparahan sedang (*moderate*) sebanyak (82,17%) dengan mekanisme interaksi yang terjadi yaitu secara farmakodinamik sebanyak (91,08%).

Kesimpulan: Terdapat potensi interaksi obat antara obat antidiabetes dengan antihipertensi

Kata Kunci: Diabetes melitus, Hipertensi, Interaksi Obat

¹Mahasiswa Prodi Farmasi Fakultas Kesehatan Universitas Jenderal Achmad Yani Yogyakarta.

²Dosen Prodi Farmasi Fakultas Kesehatan Universitas Jenderal Achmad Yani Yogyakarta.

STUDY OF INTERACTION OF ANTIDIABETES AND ANTIHYPERTENSIVE DRUGS AT PANTI RAPIH HOSPITAL

Wida Norliani¹, Novia Ariani Dewi², Siwi Padmasari²

ABSTRACT

Background: Type 2 diabetes mellitus and hypertension often coexist due to insulin resistance and hyperinsulinemia, leading to peripheral resistance, which can increase blood pressure. This condition creates the potential for drug interactions. Interactions between antidiabetic and antihypertensive medications can impact the effectiveness and safety of therapy, such as the risk of hypoglycemia, which can worsen the patient's condition. Panti Rapih Hospital serves a large number of type 2 diabetes patients with comorbid hypertension, so research is crucial to identify potential interactions between antidiabetic and antihypertensive medications.

Research Objective: To assess the interaction between antidiabetic and antihypertensive drugs at Panti Rapih Hospital.

Research Methods: This study is an observational descriptive study with a retrospective approach, conducted in the medical records department of Panti Rapih Hospital in June 2025. The study sample that met the inclusion and exclusion criteria was 98 patients. Data were analyzed using univariate analysis using Microsoft Excel to describe patient characteristics (age, gender, comorbidities), treatment profiles (name, class of antidiabetic and antihypertensive drugs), potential and severity of drug interactions (minor, moderate, major, and unknown), and interaction mechanisms (pharmacokinetics and pharmacodynamics) presented with percentage tables, the data obtained were analyzed using drugs.com and medscape.

Research Results: The majority of patients were over 60 years old (72.45%), were female (66.33%), and had comorbidities (89.80%). The most commonly used antidiabetic was metformin (27.67%), while the most commonly used antihypertensive was candesartan (17.69%). The majority of patients in this study experienced potential drug interactions (84.69%), with moderate severity (82.17%), with the interaction mechanism occurring being pharmacodynamic (91.08%).

Conclusion: There is a potential for drug interactions between antidiabetic and antihypertensive drugs.

Keyword: Diabetes mellitus, Hypertension, drug interactions

¹Students of the Pharmacy Study Program, Faculty of Health, General Achmad Yani University, Yogyakarta.

²Lecturer of the Pharmacy Study Program, Faculty of Health, General Achmad Yani University, Yogyakarta.