

## ABSTRACT

**Background:** Kidney failure is a clinical condition characterized by an irreversible decrease in kidney function, to a degree requiring permanent renal replacement therapy, in the form of dialysis or renal transplantation. Blood washing (hemodialysis, often abbreviated as HD) is one of the therapies in patients with renal failure in which case the blood washing function should be done by the kidneys replaced by machines to remove certain metabolic or toxic remnants from the human blood circulation such as water, sodium, potassium, Hydrogen, urea, creatinine, uric acid and other substances. Ureum and creatinine are chemical compounds that indicate normal kidney function.

**Aim:** Determine the differences between blood pressure pre-post hemodialysis and creatinine level pre-post hemodialysis

**Methods:** This research was conducted in March 2016-May 2017 by using analytic observational design with cross sectional approach. Data analysis was done using paired sample t test.

**Result:** This study involved 160 patients with chronic renal failure in RSUP Dr. Sardjito Yogyakarta. Patients with decreased blood pressure in accordance with JNC 8 were 56 people. All patients had decreased creatinine levels but were still relatively high.

**Conclusion:** There is a difference between high blood pressure pre-post hemodialysis with pre-post hemodialysis creatinine levels

**Keywords:** Hemodialysis, creatinine levels, blood pressure and chronic renal failure.

## INTISARI

**Latar Belakang:** Gagal ginjal adalah suatu keadaan klinis yang ditandai dengan penurunan fungsi ginjal yang ireversibel, pada suatu derajat yang memerlukan terapi pengganti ginjal tetap, berupa dialisis atau transplantasi ginjal. Cuci darah (hemodialisis, sering disingkat HD) adalah salah satu terapi pada pasien gagal ginjal dalam hal ini fungsi pencucian darah yang seharusnya dilakukan oleh ginjal diganti dengan mesin untuk mengeluarkan sisa-sisa metabolisme atau racun tertentu dari peredaran darah manusia seperti air, natrium, kalium, hidrogen, ureum, kreatinin, asam urat dan zat-zat lain. Ureum dan kreatinin merupakan senyawa kimia yang menandakan fungsi ginjal normal.

**Tujuan:** Mengetahui perbedaan tekanan darah *pre-post* hemodialisis dengan kadar kreatinin *pre-post* hemodialisis.

**Metode:** Penelitian ini dilakuakn pada bulan Maret 2016-Mei 2017 dengan menggunakan desain observasional analitik dengan pendekatan *cross sectional*. Analisis data dilakukan dengan menggunakan *paired sample t test*.

**Hasil:** Penelitian ini melibatkan 160 pasien gagal ginjal kronik di RSUP Dr. Sardjito Yogyakarta. Pasien dengan penurunan tekanan darah sesuai dengan JNC 8 didapatkan 56 orang. Seluruh pasien mengalami penurunan kadar kreatinin namun masih tergolong tinggi.

**Kesimpulan:** Terdapat perbedaan antara tekanan darah tinggi *pre-post* hemodialisis dengan kadar kreatinin *pre-post* hemodialisis.

**Kata Kunci:** Hemodialisis, kadar kreatinin, tekanan darah dan gagal ginjal kronik.