

INTISARI

Yogawanti, Krisna. 2014. *Perbedaan Hasil Pemeriksaan Kadar Asam Urat Metode Uricase Enzymatic Colorimetric Dan Metode Strip Test*. Program Studi D-IV Analis Kesehatan, Fakultas Ilmu Kesehatan Universitas Setia Budi. Pembimbing I: dr. M. I. Diah Pramudianti Sp.PK (K) M.Sc.. Pembimbing II: dr. Ratna Herawati

Kasus penyakit radang sendi banyak dijumpai di masyarakat, salah satu diantaranya adalah *arthritis gout*, atau penyakit asam urat. Penyakit ini termasuk jenis penyakit kronis, ditandai dengan peningkatan kadar asam urat darah melebihi nilai normal, akibat adanya gangguan sistem metabolisme dalam tubuh. Hingga saat ini, baik di rumah sakit maupun laboratorium, sering menggunakan metode *uricase enzymatic colorimetric* dan metode *strip test* dalam pemeriksaan kadar asam urat. Metode *strip test* memiliki kelebihan praktis dan ekonomis jika dibandingkan dengan metode *uricase enzymatic colorimetric* yang dianggap sebagai standar baku emas pemeriksaan, sehingga perlu dilakukan penelitian untuk mengetahui adanya perbedaan hasil antara kedua metode tersebut.

Sampel diambil sebanyak 30 sampel pada mahasiswa Analis Kesehatan Universitas Setia Budi Surakarta dan ditunjang oleh pustaka yang telah dipublikasikan. Pemeriksaan asam urat dilakukan menggunakan bahan serum dari darah vena dengan metode *uricase enzymatic colorimetric* dan metode *strip test* dengan bahan darah lengkap dari darah kapiler. Dilakukan uji statistik menggunakan *Independent Sample t-test*.

Hasil pemeriksaan kadar asam urat menunjukkan bahwa tidak terdapat perbedaan hasil yang bermakna secara statistik, dimana nilai rerata kadar asam urat metode *uricase enzymatic colorimetric* (4,993 mg/dl) sedikit lebih tinggi dari pada rerata kadar asam urat metode *strip test* (4,423 mg/dl). Hal ini mungkin disebabkan dari prosedur pengambilan sampel, sehingga dapat mempengaruhi hasil pemeriksaan.

Kata Kunci : *Asam Urat Darah, Metode Uricase Enzymatic Colorimetric, Metode Strip Test.*

ABSTRACT

Yogawanti, Krisna. 2014. *The Difference of Uric Acid Level Test Result Between Uricase Enzymatic Colorimetric Method and Strip Test Method*. D-IV Health Analyst Program, Faculty of Health Sciences, Setia Budi University. Supervisor I: dr. M. I. Diah Pramudianti Sp.PK (K) M.Sc.. Supervisor II: dr. Ratna Herawati

Cases of arthritis are often found in the society, one of which is arthritism, or as known as uric acid disease. This disease is classified as chronic disease, which is characterized by the increase of blood uric acid level exceed the normal limit, caused by metabolic system disorder in the body. Until now, both in hospitals and laboratories, it is often to use uricase enzymatic colorimetric method and test strip method in the examination of uric acid level. Test strip method has practical and economical advantages when it is compared with uricase enzymatic colorimetric method which is considered as the main standard of examination, so that it is necessary to do research in order to know the difference of the result between those two methods.

Thirty Health Analyst students of Setia Budi University of Surakarta were taken as samples, and supported by the literature that has been published. Uric acid test was performed using the serum material of venous blood with uricase enzymatic colorimetric method while test strip method using the material of the whole blood from capillary blood. Statistical test using independent sample t-test is performed.

The test result of uric acid level shows not significant difference statistically. It can be seen from the average level of uric acid through uricase enzymatic colorimetric method (4.993 mg/dl), which was slightly higher than the average level of uric acid through strip test method (4.423 mg/dl). Perhaps this phenomenon was caused by sampling procedures, so that it affects the outcome of the test.

Keywords : *Blood Uric Acid, Uricase Enzymatic Colorimetric Method, Strip Test Method.*