

UJI DIAGNOSTIK MALARIA DENGAN METODE *RAPID DIAGNOSTIC TEST (RDT)* PADA SUSPEK MALARIA

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ABSTRAK

Latar Belakang : Malaria masih menjadi masalah kesehatan secara global yang dapat menyebabkan kematian terutama pada kelompok resiko tinggi yaitu bayi, balita dan ibu hamil. Strategi dalam pencapaian eliminasi malaria yaitu penemuan dini kasus malaria dan pengobatan yang tepat dan cepat sehingga penularan dapat dihentikan. Diagnosis laboratorium malaria dilakukan dengan beberapa cara yaitu pemeriksaan mikroskopik dengan sediaan darah tebal dan sediaan hapus darah tipis, *Rapid Diagnostic Test (RDT)* dan *Polymerase Chain Reaction (PCR)*. Metode mikroskopik malaria sangat tergantung dari kemampuan dan pengalaman pemeriksa. Penggunaan RDT malaria di wilayah yang minim sumber daya manusia terlatih masih sangat diperlukan sehingga perlu dilakukan evaluasi terhadap keakuratan hasil diagnosis dari pemeriksaan RDT tersebut.

Tujuan penelitian: untuk mengetahui nilai uji diagnostik dari Rapid diagnostic test (RDT) meliputi sensitivitas, spesifisitas, nilai prediksi positif, nilai prediksi negatif serta akurasi serta hubungan terhadap pemeriksaan mikroskopik pada suspek malaria .

Metode penelitian: merupakan penelitian analitik observasional dengan desain komparasi metode crosssectional. Data yang didapatkan dihitung nilai uji diagnostik meliputi sensitivitas, spesifisitas, nilai prediksi positif, nilai prediksi negatif, serta akurasi. Untuk menilai hubungan antara Rapid diagnostic test (RDT) dengan pemeriksaan mikroskopis dilakukan uji statistik non parametrik Chi Square.

Hasil: dari penelitian ini didapatkan nilai uji diagnostik sensitivitas 100% spesifisitas 98,11%, nilai prediksi positif 98%, nilai prediksi negatif 100% nilai akurasi sebesar 99% serta dari uji statistic non parametrik Chi square didapatkan *pvalue* 0,000 yang artinya ada hubungan antara hasil pemeriksaan Rapid diagnostic test dan pemeriksaan mikroskopik.

Kesimpulan: RDT malaria memiliki hasil uji diagnostik yang baik untuk pemeriksaan malaria pada suspek malaria.

Kata kunci : Malaria, Uji diagnostic , Rapid diagnostic test (RDT)

MALARIA DIAGNOSTIC TEST USING THE RAPID DIAGNOSTIC TEST (RDT) METHOD ON SUSPECTED MALARIA

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ABSTRACT

Background : Malaria is still a global health problem that can cause death, especially in high-risk groups, namely infants, toddlers and pregnant women. The strategy in achieving malaria elimination is the early discovery of malaria cases and appropriate and fast treatment so that transmission can be stopped. Laboratory diagnosis of malaria is carried out in several ways, namely microscopic examination with thick blood preparations and thin blood removal preparations, Rapid Diagnostic Test (RDT) and Polymerase Chain Reaction (PCR). The microscopic method of malaria is highly dependent on the ability and experience of the examiner. The use of malaria RDT in areas with minimal trained human resources is still very necessary so it is necessary to evaluate the accuracy of the diagnosis results from the RDT examination.

The purpose of the study : to determine the diagnostic test value of the Rapid diagnostic test (RDT) including sensitivity, specificity, positive predictive value, negative predictive value and accuracy as well as the relationship to microscopic examination of suspected malaria

Research method : observational analytical research method with comparative design of cross-sectional method. The data obtained calculated diagnostic test values include sensitivity, specificity, positive prediction value, negative prediction value, and accuracy. To assess the relationship between the Rapid diagnostic test (RDT) and microscopic examination, a non-parametric statistical test of Chi Square was carried out

Result : from this study obtained a sensitivity diagnostic test value of 100%, specificity of 98.11%, a positive prediction value of 98%, a negative prediction value of 100%, an accuracy value of 99% and from a non-parametric statistical test Chi square obtained a value of 0.000 which means there is a relationship between the results of the Rapid diagnostic test and microscopic examination.

Conclusion: Malaria RDT has good diagnostic test results for malaria screening in malaria suspects.

Keywords: Malaria, Diagnostic test, Rapid diagnostic test (RDT)