**Title: OGAWA-KUDOH, FAST AND PRACTICAL METHOD FOR DIAGNOSIS OF PULMONARY TUBERCULOSIS**

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**ABSTRACT**

Tuberculosis (TB) remains an important public health problem, is an infectious disease that takes more adult deaths worldwide. The current goal of the Brazilian government, as recommended by the World Health Organization (WHO), is to find 70% of estimated cases and cure them by 85%. The diagnosis by culture is essential to reduce the number of new cases of the disease. One in three people worldwide has latent TB are infected, but do not have active disease. This study aims to evaluate two sputum samples decontamination methods used in the diagnosis of pulmonary tuberculosis: Ogawa-Kudoh and Petroff. One hundred and seventy-nine sputum samples from patients with clinically suspected pulmonary tuberculosis were submitted to decontamination methods Petroff and Ogawa-Kudoh. For analysis of the level of contamination and performance of the methods we used the McNemar test, a statistical test used to compare the agreement of paired data. The results were analyzed for sensitivity, specificity, positive predictive value (PPV), negative predictive value (NPV). Of the 179 samples, 60 (33.5%), 53 (29.6%) in the Petroff and Ogawa techniques, respectively. The infection rate was 8.38% in the method of Ogawa and 5.03% in the Petroff method. Comparing the methods there was no statistically significant difference in the level of contamination (p = 0.58) or performance (p = 1) between the methods of Ogawa and Petroff by McNemar test. 83.1% sensitivity, specificity of 96.0%, PPV of 92.5% and NPV of 90.6%. The Kappa index 0.81 Ogawa showed good agreement between the methods. Both techniques were statistically similar, p> 0.05 at the 95% confidence interval. Ogawa was effective compared to Petroff technique and has the advantage of being a quick methodology, inexpensive, easy to perform and less risk of contamination of the handler with the sample.

Key Words: tuberculosis; cultures; *M. tuberculosis*; Ogawa-Kudoh.