

Covid-19 Pandemic Impact on Drug Resistance Tuberculosis Prevention Program; a Qualitative Study in Aceh, Indonesia

Ichsan Ichsan^{1-4*}, Herlina Dimiati^{1,6}, Taufik Suryadi^{1,5}, Muhammad Yani^{1,8}, Mudatsir Mudatsir¹⁻³, Maimun Syukri^{1,7**}

¹Doctoral Program in Medical Science, Faculty of Medicine, Universitas Syiah Kuala, Banda Aceh, 23111, Indonesia.

²Department of Microbiology, Faculty of Medicine, Universitas Syiah Kuala, Banda Aceh, 23111 Indonesia,

³Medical Research Unit, Faculty of Medicine, Universitas Syiah Kuala, Banda Aceh, 23111 Indonesia

⁴Department of Family Medicine, Faculty of Medicine, Universitas Syiah Kuala, Banda Aceh, 23111 Indonesia

⁵Department of Forensic Medicine and Medico-legal, Faculty of Medicine, Universitas Syiah Kuala, Banda Aceh, 23111 Indonesia.

⁶Department of Pediatric, Faculty of Medicine, Universitas Syiah Kuala, Banda Aceh, 23111 Indonesia

⁷Department of Internal Medicine, Faculty of Medicine, Universitas Syiah Kuala, Banda Aceh, 23111 Indonesia

⁸Department of Public Health, Faculty of Medicine, Universitas Syiah Kuala, Banda Aceh, 23111 Indonesia

*Presenter: Ichsan Ichsan

**Corresponding Author: Maimun Syukri

Context: The third wave of COVID-19 pandemic led to the impact on interrupted care of chronic diseases. In Aceh province of Indonesia tuberculosis remain the major health problem even prior the Pandemic. The government established several national tuberculosis prevention programs to control this infection in all provinces. Nevertheless, the Covid-19 pandemic caused the waning of positive outcome on this effort.

Objective: To identify the effect of Covid-19 pandemic on drug resistance tuberculosis prevention program in Aceh.

Design: A qualitative study using deep interview conducted to five key persons related to TB control in Aceh Province. They were representing the Provincial Health Office, Public Health Center, family physician, referral hospital and clinical microbiology laboratory. The qualitative analysis used the Miles and Huberman model which consists of three streams of activities: data reduction, data presentation and conclusions drawing or verification.

Results: Key persons in this study report major changes and significant barriers in drug resistance tuberculosis prevention program due to Covid-19 pandemic. In the point of view health system, two main impacts were the shifting of the government's focus to Covid-19 emergency response

and refocusing of health budget in reducing the transmission of Covid-19 led to the abandonment of the tuberculosis prevention program. Another prominent finding were the burnout of health work forces, TB therapy interruption, patient reluctance to visit public health center and the economic burden have become a cogent impact.

Conclusion: Panic response of stakeholders to Covid-19 pandemic, the burnout of health work force, social insecure and economic burden were significantly influenced the drug resistance tuberculosis prevention program in Aceh. TB patients were neglected for several months during peak season of the pandemic and subsequently interrupt the national tuberculosis prevention program and contributed to the uplift of drug-resistance tuberculosis in Aceh. This study has identified noteworthy comprehensive factors which needed to be improved in our health system on a non-natural disaster setting such as pandemic in the future.

Keywords: Covid-19, Pandemic, Tuberculosis, Prevention, Drug-resistance