

The southeast asian journal of tropical medicine and public health

Deskripsi Lengkap: <https://lib.ui.ac.id/detail?id=20441638&lokasi=lokal>

Abstrak

This study aimed to demonstrate class switch recombination (CSR) in heavy chain expressing immunoglobulin G (IgG) and IgE in human B cells (CD20+CD27-) were cultured with crude *P. falciparum* antigen (cPfAg) and anti-CD40. on day 4 post-exposure, total RNA from B cells was prepared and the occurrence of CSR from IgM to IgG and/or IgE was investigated by reverse transcription-polymerase chain reaction. Molecular markers to detect active CSR included enzyme activation-induced cytidine deaminase mRNA, γ and ϵ -germline transcripts (γ, ϵ -GLT), circle transcript (CT) and mature transcript (γ and ϵ -mRNA) expression. On day 7 and day 14 after exposure, levels of Igs in the culture supernatant were determined by enzyme-linked immunosorbent assay. Our findings showed that we could demonstrate cPfAg-stimulated B cells undergoing CSR by use of the expressed CSR markers and the increase in specific IgG and IgE indicating the potential of this approach in the study of CSR in *P. falciparum* stimulated B cells.