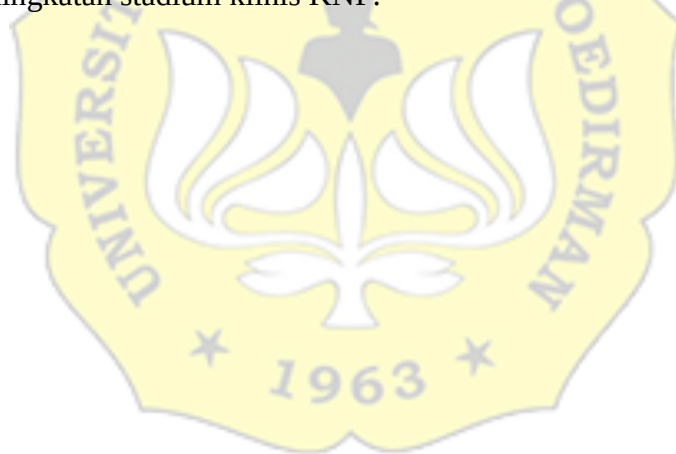


RINGKASAN

Tisna Sendy Pratama, P2BA14011. Ekspresi Relatif mRNA LMP2A Virus Epstein Barr Sebagai Petanda Biologi Molekuler Progresivitas Karsinoma Nasofaring. Tesis, Program Studi Magister Ilmu Biologi universitas Jenderal Soedirman. Pembimbing I Dr. Daniel Joko W, M.BioMed; Pembimbing II Dr. Hendro Pramono, MS.

Karsinoma nasofaring (KNF) adalah keganasan yang tersering di kepala dan Leher. Karsinogenesis KNF dipengaruhi oleh banyak faktor seperti faktor lingkungan, genetik, dan infeksi virus. Epstein Barr Virus (EBV) terbukti berperan penting dalam karsinogenesis KNF melalui induksi *epithelial-mesenchymal transition* (EMT) dan inhibisi of Akt inhibitor. Penelitian ini mengidentifikasi hubungan antara stadium klinis KNF, klasifikasi TNM, dan ekspresi relatif mRNA LMP2A. Biopsi *formalin-fixed parafin-embedded* (FFPE) dari jaringan tumor primer terkumpul dari pasien 24 KNF. Sampel diproses menggunakan qRT-PCR. Data di analisa dengan metode $2^{-\Delta C_t}$ dan dianalisis secara statistik. Seluruh sampel mengekspresikan LMP2A. Berdasarkan analisis statistik tidak ditemukan hubungan stadium tumor dan klasifikasi TNM dengan ekspresi relatif mRNA LMP2A. Namun demikian terdapat tren penurunan Ct dengan peningkatan stadium klinis KNF.



SUMMARY

Tisna Sendy Pratama, P2BA14011. Relatif Expression LMP2A mRNA of Epstein Barr Virus as Molecular Biomarker of Nasopharyngeal Progressivity. Tesis, Magister Biology program of Jenderal Soedirman University. Adviser I Dr. Daniel Joko W, M.BioMed; Adviser II Dr. Hendro Pramono, MS.

Nasopharyngeal Carcinoma (NPC) is the most common malignancy of the head and neck. Carcinogenesis of NPC influenced by many factors, generally an interaction between genetic, environmental factors, and virus infection. Epstein Barr Virus (EBV) proved to play an important role in carcinogenesis of NPC. LMP2A closely associated with carcinogenesis of NPC through the induction of epithelial-mesenchymal transition (EMT) and inhibition of Akt inhibitor. This study identified relationship between KNF clinical stage, TNM Classification, and relative mRNA LMP2A expression. Formalin-fixed parafin-embedded (FFPE) biopsy from primary tumor were collected from 24 nasopharyngeal carcinoma patients. The samples collected underwent qRT-PCR. Data were analyzed by $2^{-\Delta C_t}$ methods and statistical analysis. All sampel express mRNA LMP2A. We found that LMP2A not associated with increased tumor stage and TNM classification statistically. However, there is a decreasing trend of Ct in accordance with the increase of clinical stage.

