

ABSTRAK

HUBUNGAN DERAJAT KEASAMAN (pH) SALIVA DENGAN KARIES GIGI ANAK THALASSEMIA BETA MAYOR USIA 12-17 TAHUN DI RSUD BANYUMAS

Hafizh Zufar Pramuditya

Latar Belakang. Angka karies (Indeks DMF-T) pada anak thalassemia termasuk dalam kategori tinggi dibandingkan dengan anak yang normal, demikian juga faktor risiko serta jumlah penderita thalassemia beta mayor terutama di Kabupaten Banyumas terus meningkat dari tahun ke tahun. Oleh karena itu, dilakukan penelitian untuk mengetahui faktor-faktor komponen saliva yang dapat meningkatkan risiko karies pada anak thalassemia beta mayor. **Tujuan.** Mengetahui hubungan antara pH saliva dengan karies gigi anak thalassemia beta mayor pada usia 12-17 tahun di RSUD Banyumas. **Metode.** Penelitian ini merupakan penelitian observasional analitik dengan pendekatan *cross sectional*. Populasi penelitian ini adalah seluruh pasien anak thalassemia beta mayor berusia 12-17 tahun di RSUD Banyumas. Sejumlah 68 anak dipilih sebagai sampel dengan teknik *purposive sampling*. Pengumpulan data dengan pengambilan sampel saliva dan pengukuran indeks DMF-T. Pengumpulan saliva dengan metode *spitting*. pH saliva kemudian diukur dan dicatat. Data dianalisis secara statistik menggunakan uji normalitas *Kolmogorov smirnov* dan uji linearitas. Kemudian dilakukan uji korelasi *Pearson's product Moment*. **Hasil.** Hasil uji korelasi Person's Product Moment dan diperoleh nilai $p < 0.000$ ($p < 0.001$) yang menunjukkan bahwa korelasi antara pH saliva dan Indeks DMF-T bermakna. Nilai korelasi pearson sebesar -0.925 menunjukkan korelasi memiliki arah hubungan negatif dengan kekuatan korelasi yang sangat kuat. **Simpulan.** Terdapat hubungan antara pH saliva dengan karies gigi anak thalassemia beta mayor pada usia 12-17 tahun di RSUD Banyumas. Semakin rendah pH saliva, semakin tinggi karies gigi pada anak thalassemia beta mayor.

Kata Kunci. pH Saliva, karies, thalassemia beta mayor

ABSTRACT

THE CORRELATION BETWEEN THE DEGREE OF ACIDITY (pH) SALIVA WITH DENTAL CARIES OF THALASSEMIA BETA MAYOR CHILDREN 12-17 YEARS OLD AT BANYUMAS HOSPITAL

Hafizh Zufar Pramuditya

Background. The caries rate (DMF-T index) in thalassemia children is in high category compared to normal children. The increasing of caries risk factors and the number of beta thalassemia major patients in Banyumas Regency recently increase from year to year. Therefore, it is necessary to conduct research on the pH of saliva with caries in children with beta thalassemia major. **Purpose.** To determine the correlation between salivary pH and dental caries in children with beta thalassemia major at the age of 12-17 years at Banyumas General Hospital. **Method.** This research was an analytic observational study with cross sectional approach. The population of this study were all patients with beta thalassemia major aged 12-17 years at Banyumas General Hospital. The sampling technique was purposive sampling. The saliva were collected from each sample with spitting method. The pH saliva were measured and recorded. The DMFT index were observed by calibrated observer. The data were analyzed statistically using the normality Kolmogorov Smirnov test and linearity test. Then the correlation Pearson's product moment test was performed **Result.** The statistical analysis showed strong correlation between salivary pH and DMF-T index ($p < 0.001$, $CC = -0.925$) which indicates that the correlation between salivary pH and DMF-T index is significant. The Pearson correlation value of -0.925 indicates that the correlation has a negative direction with a very strong correlation. **Conclusion.** There is a correlation between salivary pH and dental caries in children with beta thalassemia major at the age of 12-17 years at Banyumas General Hospital. As the pH saliva were decreased, the dental caries in children with beta thalassemia major were increased.

Keywords. pH of Saliva, caries, thalassemia beta major