

## ABSTRACT

### Comparison of Anemia Status in Cases of Undernutrition Children and Normal Children at SDN 2 Neglasari, South Lampung.

By

MOCHAMAD FAUZAN DAVA

**Background:** The health and nutritional status of children play a crucial role in understanding community health conditions. Undernutrition in children can be a primary cause of health issues, including a decline in hemoglobin levels and the prevalence of anemia. This study aims to compare the anemia status related to hemoglobin levels in undernourished children and normal children at SDN 2 Neglasari Lampung Selatan.

**Method:** A cross-sectional research design was employed with a simple random sampling technique. Sixty-three children participated as subjects in the study. Hemoglobin levels were measured using the Spectrophotometry method, and nutritional status was assessed based on BMI-for-age according to the Ministry of Health standards. Data were analyzed through univariate analysis and statistical tests, including kruskall wallis with post hoc mann whitney and proportion Test, to evaluate differences between undernourished and normal groups.

**Results:** Based on univariate results, the nutritional status overview indicated 58.7% good, 25.4% less, and 15.9% poor nutrition. Nine children were anemic, while 54 were not, with average hemoglobin levels of 12.976 g/dl for good nutrition, 12.125 g/dl for poor nutrition, and 11.660 g/dl. Bivariate analysis revealed a significant difference in hemoglobin levels and anemia status between low and normal nutritional status, with a p-value < 0.05.

**Conclusion:** A significant difference exists in anemia status related to hemoglobin levels between undernourished and normal children at SDN 2 Neglasari Lampung Selatan.

**Keywords:** Anemia status, hemoglobin levels, undernutrition

## ABSTRAK

### PERBANDINGAN STATUS ANEMIA PADA KASUS ANAK *UNDERNUTRITION* DAN ANAK NORMAL DI SDN 2 NEGLASARI LAMPUNG SELATAN

Oleh

MOCHAMAD FAUZAN DAVA

**Latar Belakang:** Kesehatan dan status gizi anak-anak menjadi faktor kunci dalam memahami kondisi kesehatan masyarakat. *Undernutrition* pada anak-anak dapat menjadi penyebab utama permasalahan kesehatan, termasuk penurunan kadar hemoglobin dan status anemia. Penelitian ini bertujuan untuk membandingkan status anemia terkait kadar hemoglobin pada anak-anak *undernutrition* dan anak-anak normal di SDN 2 Neglasari Lampung Selatan.

**Metode:** Desain penelitian *cross-sectional* dengan teknik pengambilan sampel secara *simple random sampling*. Sebanyak 63 anak menjadi subjek penelitian. Data kadar hemoglobin diukur menggunakan metode Spektrofotometri, sedangkan status gizi dinilai berdasarkan IMT/U menurut umur. Data dianalisis secara univariat serta dilakukan uji statistik *kruskal wallis* dengan *pos hoc mann whitney* dan uji proporsi untuk mengevaluasi perbedaan antara kelompok *undernutrition* dan kelompok normal.

**Hasil:** Berdasarkan hasil univariat, gambaran status gizi baik sebesar 58,7%, gizi kurang 25,4%, dan gizi buruk 15,9%. Didapatkan juga anemia 9 anak dan 54 anak tidak anemia dengan rata-rata kadar hemoglobin 12.976 g/dl untuk gizi baik, 12.125 g/dl untuk gizi kurang, dan 11.660 g/dl. Analisis bivariat, terdapat perbedaan signifikan untuk kadar hemoglobin dan juga status anemia pada status gizi rendah dan normal dengan nilai  $p < 0,05$ .

**Simpulan:** Terdapat perbedaan signifikan status anemia terkait kadar hemoglobin pada kasus anak *undernutrition* dan anak normal di SDN 2 Neglasari Lampung Selatan.

**Kata Kunci:** Status anemia, kadar hemoglobin, status gizi rendah