## Hematological Findings In Various Hemoglobinopathies : A 3 Years Study At Tertiary Care Centre

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## Abstract

Introduction: Hemoglobinopathies constitute a very important causative factor for anaemias of childhood. Two common hemoglobinopathies in India are Beta Thalassemia and Sickling disorders. Objective: The objective of this study is to know the hematological findings in various types of hemoglobinopathies & their distribution in various age and sex groups & communities, so that a solid conclusion can be made about screening of these hemoglobinopathies on high risk basis. Material and Methods: This is an observational study in 100 known patients of hemoglobinopathies who came to a tertiary care hospital from September 2015 to September 2018. Screening hematological tests for hemoglobinopathies such as complete blood count indices with Mentzer's Index, Sickling test & peripheral blood smears were performed on all the patients and analyzed. Results: All the patients were having characteristic hematological findings. Among the 100 patients there were 56 males and 44 females with age group ranging from 1 year to 32 years. 54% patients were having Beta Thalassemia, 40% patients were having Sickle cell disorder & 6% were having combination of both. Beta Thalassemia was most common in Bhanushali community and Sickle cell disorder was most common in Lohana community. Conclusion: Hemoglobinopathies can be diagnosed earlier with meticulous use of simple & cost effective hematological screening tests in high risk age groups and communities in developing countries like India.

Keywords: Beta Thalassemia, Mentzer's Index, Peripheral blood smear, Sickling Disorder, Sickling test.