Management and Outcome of External Anterior Abdominal Wall Congenital Defects at a tertiary Hospital in Low Resource Setting, North Western Tanzania

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Abstract

Anterior abdominal wall defects have been thought to be rare disease. However, their trends of morbidity and mortality have been increasing. Due to their clinical presentation, management of congenital anterior abdominal wall defects have being challenging for a long time. While the survival rate in most centers in developed countries recent is approaching 100% due to variability of the choices of management, mortality rate in some of the congenital anomalies in developing countries is up to 100%

Study Design and setting

This study was a longitudinal study for one year from January to December 2015 in order to determine the prevalence, clinical patterns and outcome of intervention done to pediatric patients with anterior abdominal wall defects at Bugando Medical Centre.

Results

Among 512 patients with congenital anomalies enrolled in the study, 83 (16.2%) patients had anterior abdominal wall defects out of which26 (31.3%) Omphalocele, 22 (26.5%) gastroschisis, 18 (21.7%) Umbilical Hernia, 7(8.4%) Inguinal Hernia, 7(8.4%) Bladder exstrophy and 3 (3.6%) conjoint twins. 35 patients (42.2%) were managed surgically. Sepsis was the only complication documented and Mortality of 7.2% was observed in this study

with 100% mortality rate in patients with gastroschisis. 37 (48.1%) patients were discharged with permanent defect.

Conclusion

Anterior abdominal wall defects are not uncommon congenital anomalies in our setting. And, their management is still most challenging in our settings. The outcome of management especially for gastroschisis, Omphalocele and bladder exstrophy not good. There should be improvement on pre referral care in referring centers, improving diagnostic facilities, training pediatric surgeons to facilitate the management.

Keywords: gastroschisis