

Top Five Causes of Neck Mass in Chattogram

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Abstract

Background: Identifying top problems in any discipline is very important for diagnosis and effective management. Unfortunately there is a knowledge gap in Chattogram, Bangladesh. To fill up the gap we have conducted the study.

Materials and methods : It was a retrospective study based on hospital records of Chattogram General Hospital from January 2017 to December 2017. All (104) cases with neck mass were included. Age, sex, clinical diagnosis, histo-pathological diagnosis and management were noted. Data were managed manually.

Results: Total 104 cases were studied among the cases 65% were female and 35% were male. 91% cases were of 10-50 years age group. Highest cases 33% were found in 20-30 years age group. According to Histo-pathological report 25% cases were Tubercular lymphadenopathy, Nonspecific lymphadenopathy were 17% and Multi-nodular goiter were 15%. Results were contrasted with previous studies.

Conclusion: Top 05 causes of neck mass in Chattogram have been unveiled. Tuberculosis is still number one problem. So, TB control program should be evaluated further to find out causes of high TB cases in this region.

Key words: Causes; Neck mass; Chattogram.

INTRODUCTION

Neck masses are common in general practice. These are usually painless and slow growing. Some may be present at birth and some may develop later¹. Clinically neck masses can be divided into² :

A. Midline Masses

Enlarged Lymph node, Dermoid, Ludwig angina, Thyroglossal cyst
Aberrant thyroid, Thyroid Isthmus Tumor, Laryngeal Malignancy etc.

B. Lateral Aspect Masses

Inflammatory Lymph Nodes, Metastatic Lymph nodes
Neoplastic Lymph Nodes, Cystic hygroma, Sub clavian aneurysm
Salivary gland inflammation, Salivary gland tumor
Branchial cyst, Pharyngeal pouch, Swelling of thyroid lobe.

Neck Masses Can be Classified According to Onset of the Problem³:

A. Acute (Days to weeks)

Tubercular lymphadenopathy
Non Specific lymphadenopathy (Bacterial, Viral)
Acute sialadenitis, Hematoma etc.

B. Sub Acute (Weeks to months)

Squamous cell carcinoma of tongue, Carcinoma Larynx
Lymphoma, Metastasis, Salivary gland tumor.

C. Chronic (Months to years)

Thyroid mass (Benign or malignant) Lipoma
Laryngocele, Branchial cyst, Thyroglossal cyst etc.

The primary concern of neck mass is to exclude malignancy. Malignancies are common usually over 40 years smoker group. History and physical examination often diagnose neck mass. In some cases ultrasonography, CT Scan, FNAC may be needed⁴. In our context excision and histopathology is the most cost-effective option for diagnosis and management of neck masses. CT scan helps particularly for malignancy to see its extension. FNAC also helpful but it is less sensitive than histopathology.

MATERIALS AND METHODS

It is a retrospective observational study. The study was conducted at Chattogram General Hospital with due permission from the authority. Hospital records from January 2017 to December 2017 were studied. Sample size 104. Available data related to age, sex, clinical diagnosis, management and histo-pathological diagnosis were noted. Data were managed manually. Results were compared and contrasted with previous similar studies.

RESULTS

Total 104 cases were studied. Among them 65% were female and 35% were male. Maximum case holding age group was 20-30 years. It was 33% and is followed by 10-20 years 23%, 30-40Years 21% and 40-50Years 14% respectively. Histopathologically TB Lymphadenopathy was the top ranking 26(25%) followed by Non specific Lymphadenitis 18(17%) Multinodular goiter 16(15%) Thyroid cancer 7% respectively. Metastatic carcinoma and lymphoma hold 5th position jointly i.e 5%. Others were lipoma 4%, pleomorphic adenoma 4%, Benign mesenchymal lesion 4%, bronchial cyst 3%, neurofibroma 3%, thyroglossal cyst 3%, hemangioma 3%, Sialadenitis 2%.

Table I : Age group of the cases.

Age Range	No. of patients(%)
0-10 Years	02(02%)
10-20 Years	24(23%)
20-30 Years	34(33%)
30-40 Years	22(21%)
40-50 Years	15(14%)
50-60 Years	05(05%)
60-70 Years	02(02%)
Total	104(100%)

Source: Hospital records 2017.

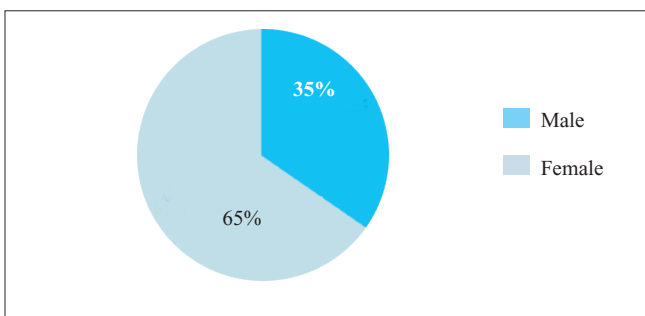


Figure 1 : Cases according to sex.

Table II : Histopathological diagnosis of neck mass.

Diagnosis	No.of cases (%)
TB Lymphadenopathy	26(25%)
Non specific lymphadenitis	18(17%)
Multinodular goiter	16(15%)
Thyroid Cancer	07(07%)
Metastatic carcinoma	05(05%)
Lymphoma	05(05%)

Source: Hospital records 2017.

DISCUSSION

In this study no malignant case was found in 0-20 years age group. All thyroid malignancies were found within 20-40 years age group. All metastatic cases and lymphoma were found in 40-60 years age group. Tubercular lymphadenopathy was found in all age groups. Non specific lymphadenitis was also found in all age groups. According to Mahmudul Hoq et al TB lymphadenopathy and Multinodular goiter 24% respectively. Thyroid carcinoma, metastatic carcinoma and lymphoma 10% respectively⁵. They also noted about, non specific inflammatory condition, benign and congenital lesions. There is no significant difference at first position in both the studies (p<0.03) but second position differs significantly i.e Non specific lymphadenitis and multinodular goiter. Malignancies are available in both the studies but quantitative difference has been observed. The difference may be due to regional variation. In western countries TB lymphadenopathy is significantly less than that of Bangladesh. It arises question about effectivity of anti TB program in Bangladesh.

CONCLUSION

Top five causes of neck mass in Chattogram region have been identified. Very high rate of TB lymphadenopathy needs further evaluation of anti TB program in Bangladesh.

DISCLOSURE

All the authors declared no competing interest.

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