ISSN No:-2456-2165 https://doi.org/10.38124/ijisrt/26jan296

A Case Study of 43 Year Old Male with Bilateral Cervical Lymphadenopathy: A Detail Discussion and Management

Kirtick Poovendran[1]; Omar Mirza Baig[2]; Mohammad Ibrahim Hashmi[3]; Mohammad Umar Khan[4]; Sidra Izhar[5]

Facuilty of Medicine
Tbilisi State Medical University, Tbilisi, Georgia

Publication Date: 2026/01/10

Abstract:

- ***Back Ground***

Hodgkin lymphoma (HL) is a rare B-cell malignancy mostly present in adolescents or young adults with patients noticing a painless lump in the neck. It usually starts infecting locally usually involving one lymph node which then spreads to nearby lymph nodes, infecting a larger area commonly involving the cervical region and the mediastinal region with only 20–30% of patients experiencing systemic "B" symptom

- ***Case Presentation***

A 43-year-old male presented with multiple painless cervical and bilateral supraclavicular lymph node swellings of 1.5 years' duration, with a history of slow progression over the past 10 years. There were no constitutional symptoms or significant comorbidities, and systemic examination was unremarkable. Local examination revealed multiple non-tender, discrete lymph nodes with normal overlying skin. Excision biopsy of a right cervical lymph node confirmed bilateral cervical lymphadenopathy, with Hodgkin's lymphoma considered as a possible diagnosis.

- ***Management And Outcome***

The patient was admitted for evaluation of chronic bilateral cervical and supraclavicular lymphadenopathy. Following clinical assessment and investigations, an excision biopsy of the right cervical lymph node was performed under general anesthesia. Postoperatively, the patient received antibiotics, analgesics, and supportive care with close monitoring. The postoperative course was uneventful, and the patient was discharged with follow-up advice.

- ***Discussion***

Hodgkin's lymphoma is a B-cell malignancy that commonly presents with painless cervical and supraclavicular lymphadenopathy, predominantly affecting young adult males and accounting for approximately 11% of all lymphomas. Diagnosis requires excision biopsy demonstrating characteristic Reed–Sternberg cells with supportive immunophenotyping, as fine-needle aspiration is often inadequate. Clinical staging is performed using the Ann Arbor system, which guides prognosis and management. Despite excellent survival outcomes with modern therapy, atypical indolent presentations without B symptoms require careful histopathological confirmation.

- ***Conclusion***

This case highlights the diagnostic challenge of long-standing painless cervical lymphadenopathy with supraclavicular involvement. The absence of constitutional symptoms with progressive nodal enlargement raised suspicion of Hodgkin's lymphoma. Excision biopsy was essential for definitive diagnosis, underscoring the importance of histopathological evaluation in persistent lymphadenopathy.

How to Cite: Kirtick Poovendran; Omar Mirza Baig; Mohammad Ibrahim Hashmi; Mohammad Umar Khan; Sidra Izhar (2026) A Case Study of 43 Year Old Male with Bilateral Cervical Lymphadenopathy: A Detail Discussion and Management. *International Journal of Innovative Science and Research Technology*, 11(1), 402-405. https://doi.org/10.38124/ijisrt/26jan296

ISSN No:-2456-2165 https://doi.org/10.38124/ijisrt/26jan296

I. INTRODUCTION

Bilateral cervical lymphadenopathy is the enlargement of lymph nodes present in the cervical region on both the regions of the neck and it is a common clinical finding with several etiological factors like infections, immune disorders, and malignancies . It is benign in most cases, but certain features can raise the concern for malignancy. Risk factors for malignant lymphadenopathy include age 40 years or above, male sex, involvement of supraclavicular nodes, and systemic B symptoms like fever, night sweats and weight loss [1]. Retrospective studies found that reactive lymphadenitis was the most frequent biopsy finding with about 44.5% in adult cervical nodes, whereas malignancy was identified in about 38.6% of cases . In that study, patients older than 40years were more likely to have cancer [2]. In our 43-year-old patient with longstanding bilateral supraclavicular and lateral neck node enlargement with no systemic symptoms, these demographic and exam factors raise concern for lymphoma despite the indolent course.

Hodgkin lymphoma (HL) is a rare B-cell malignancy mostly present in adolescents or young adults with patients noticing a painless lump in the neck . It usually starts infecting locally, usually involving one lymph node which then spreads to nearby lymph nodes, infecting a larger area commonly involving the cervical region and the mediastinal region with only 20–30% of patients experiencing systemic “B” symptom [3]. The subtype of HL is Nodular Lymphocyte Predominant Hodgkin Lymphoma (NLPHL), which is more common in middle-aged men and often causes slow-growing localized painless lymphadenopathy which is usually cervical along with few systemic signs . HL can be cured if it is found and treated on time, given that HL responds well to treatment and has a high cure rate and any suspicious lymph node swelling should be investigated. Definitive diagnosis of HL relies on excisional lymph node biopsy to identify the Reed–Sternberg cells which are very few in number and are scattered among many normal inflammatory cells, since small area needle sampling often misses these sparse malignant cells giving misleading results, that’s why its recommended to examine the entire lymph node for more accurate results [3]. To summarise this, our patient’s age, sex, and isolated cervical lymphadenopathy make lymphoma a leading consideration, and histopathological tissue evaluation of the lymph node is required to confirm the diagnosis [2].

II. CASE PRESENTATION

A 43 year old male came with the complaint of swelling over the right cervical and right and left supraclavicular region for past 1.5 years ,he was normal 10 years back after he developed swelling over the left lateral aspect of neck , which was gradual in onset and progressive in nature .Initially swelling was smaller and gradually increased to attain the current size on doctor visit . N/H/O weight loss , loss of appetite ,fever, nausea , vomiting , constipation and loose stools .No known cases of T2DM/BA/PTB/CAD/CKD. The patient was non alcoholic and non smoker.

- *Physical Findings*

Patient was oriented , afebrile and conscious
BP :120/80 mmHg .PR - 78/min

- *Systemic Findings*

CVS- S1S2 +
RS - B/L AE +
P/A -soft, bowel sounds+Non-tender

- *Local Examination*

- *On Inspection*

Swelling of size 3x3 cm on right side of neck , swelling of size 2x2 cm over right and left supraclavicular region , swelling of size 3x3 cm over the left lateral aspect of neck was seen and no scars or redness or pus or surrounding induration was seen.

- *On Palpation*

Swelling was felt over right lateral aspect of neck and bilateral supraclavicular .no warmth or tenderness or thyroid swelling or redness or hyoid bone abnormalities or skin necrosis were seen

Lateral from excision biopsy (from right side cervical lymph node) and lab reports confirmed diagnosis of bilateral cervical lymphadenopathy but doctors doubted Hodgkin's lymphoma.

III. DISCUSSION

Hodgkin’s lymphoma (HL) is characteristically a B-cell neoplasm that involves cervical lymph nodal region and is most commonly present in young adults [4]. It accounts for roughly 11% of all lymphomas (incidence ~2.6 per 100,000 in the US) and has a bimodal age distribution (first peak age 20–40, second peak >55 years) [5]. This disease is more commonly presented in males. Modern combined-modality therapy yields excellent outcomes (5-year survival exceeding ~80%), making HL a paradigm of treatment success [4]. However, long-term morbidity from therapy (especially in adolescents/young adults) remains an important concern [8].

The patients can present with one or more painless lymph node enlargements in supraclavicular and anterior cervical region [5]. Symptoms such as chest discomfort and cough are present in other forms of Nodular Sclerosis Hodgkin's Lymphoma [4]. Generalized pruritus or nodal pain can be associated with alcohol intoxication. Diagnostic evaluation such as on physical examination, the nodes are seen to be discrete and non-tender. Further baseline evaluation is also necessary and it involves laboratory testing such as CBC, LDH, HIV serology and imaging for a better conclusion [7]. Lymph node biopsy excision is also further required as a diagnostic tool as fine needle aspiration fails to demonstrate the spars neoplastic cells. Identification of classic Reed–Sternberg (RS) cells in the biopsy is essential to confirm the diagnosis of Hodgkin's Lymphoma . Classically, Hodgkin's lymphoma is defined by the presence of Reed Sternberg cells which are large, multinucleated and are known as “owl’s-eye” cells because of their appearance [6].

ISSN No:-2456-2165 https://doi.org/10.38124/ijisrt/26jan296

These RS cells are the malignant component and are seen to be positive for CD15 and CD30, while being usually negative for the B-cell marker CD20. The RS cells secrete cytokines that recruit the inflammatory milieu. By contrast, nodular lymphocyte-predominant (LP) HL (~ 5% of cases) lacks RS cells and shows "popcorn" (LP) cells with folded multilobulated nuclei. LP cells are strongly positive for B-cell markers (CD20, CD45, CD79a) and lack CD15/30. HL has several and distinctive features on microscopy like : nodular sclerosis presented in young adults which exhibits broad bands of fibrosis and lacunar variant RS cells, other subtype like mixed-cellularity HL shows a diffuse, cellular infiltrate with numerous classic RS cells and minimal fibrosis [8]. The lymphocyte rich variant has nodular structure and is dominated by small lymphocytes with few RS cells, and the lymphocyte depleted variant is paucicellular with extensive fibrosis/necrosis and many RS cells. Therefore, correct classification requires careful assessment of morphology and immunophenotype. Ann Arbor system is a staging method for Hodgkin's Lymphoma, which is based on involvement of the nodal and extranodal extension of the body [6]. Stage I involves a single lymph node region or a single extra lymphatic site, whereas Stage II involves two or more nodal regions on the same side of the diaphragm. Further stages like Stage III involve nodes on both sides of the diaphragm (with IIIA indicating absence of systemic symptoms and IIIB with B symptoms) [6]. The patient is reported to have 'B' symptoms when they present with symptoms such as fever, night sweats, and weight loss [9]. Diffuse or wide involvement within one or more extra-lymphatic organs is indicated by stage IV. The prognosis for early-stage HL (I-IIA without unfavorable characteristics) is excellent, while the cure rate for advanced disease is steadily declining [7]. The 5-year survival rate for stage I-II disease is over 90%, whereas for stage IV disease is only approximately 60%. Risk categorization can be further refined by several factors, including age, gender, bulky illness, and blood counts (e.g., increased ESR or low lymphocyte count). Stage categorization is still the main therapeutic recommendation [4].

On physical examination, our patient was noted to have a firm right lateral cervical node lymphadenopathy, and in the other regions, such as bilateral supraclavicular and left lateral aspect of neck lymph nodes were seen to be soft and non-tender in consistency**.** Classically, Hodgkin's Lymphoma nodes are generally firm, discrete, and non-tender, whereas the nodes that are soft can reflect other conditions like reactive hyperplasia or early involvement of other lymphoproliferative disorders. The excision biopsy of the patient revealed friable and matted lymph nodes that are consistent with nodal involvement which is seen in nodular sclerosis subtypes. The patient's presentation aligns more accurately with Stage IIA Hodgkin's Lymphoma, as there is involvement of two and more nodal regions which are present on the same side of the diaphragm. The patient was noted to have absence of B symptoms (fever, night sweats, and weight loss) and prolonged indolence over a decade which is atypical for untreated Hodgkin's lymphoma. The usual case of Hodgkin's Lymphoma progresses over months rather than years. A definitive diagnosis is hence required, along with histopathological confirmation of Reed–Sternberg cells and immunophenotyping**.**

IV. MANAGEMENT

The patient was admitted for evaluation of bilateral cervical and supraclavicular lymphadenopathy. A detailed clinical assessment was performed including history and physical examination, which revealed no constitutional symptoms such as fever, weight loss or loss of appetite. Baseline vital signs were stable throughout the hospital stay so, considering the chronic progression, distribution and enlargement of lymph node, a definitive diagnostic approach was planned.

After completion of relevant investigations, the patient underwent an excision biopsy of the right cervical lymph node on 26/11/25 under general anesthesia. A small incision was made over the right cervical region and multiple lymph nodes, including a friable lymph node, a small lymph node and several matted lymph nodes were excised and sent for histopathological examination. Hemostasis was achieved and the incision was closed with staplers followed by a sterile compression dressing.

Postoperatively, the patient was managed with intravenous fluids, antibiotics, analgesics and supportive care. Antibiotic therapy included cefixime in combination with clavulanic acid to prevent any postoperative infection. Analgesic management was provided using paracetamol to make sure adequate pain control is achieved. Ondansetron was administered for the prevention and treatment of postoperative nausea and vomiting. Pantoprazole was prescribed as gastric acid suppression therapy to prevent stress-related gastric complications during the postoperative period. The patient was closely monitored for signs of infection, bleeding or wound related complications.

The postoperative course was stable, with the patient remaining afebrile and hemodynamically stable. Gradually oral intake was resumed and the patient tolerated a normal diet. The patient's condition improved with medical management and no immediate postoperative complications were seen. He was discharged in improved condition and with advice to continue prescribed medications, maintain wound care and attend scheduled outpatient follow-up. A review in the surgery outpatient department was planned to evaluate wound healing and to discuss the histopathological findings which would determine the need for further management.

V. CONCLUSION

This case highlights the diagnostic challenges presented by long-standing cervical lymphadenopathy with recent progression and supraclavicular involvement. The clinical presentation is characterized by painless and firm cervical lymph nodes and absence of systemic B symptoms raised suspicion for Hodgkin's lymphoma while also suggesting an atypical indolent disease course. Excision biopsy was performed to establish a definitive diagnosis, as clinical findings alone are insufficient for accurate classification. This

ISSN No:-2456-2165 https://doi.org/10.38124/ijisrt/26jan296

case emphasizes the importance of thorough clinical evaluation and timely histopathological assessment in patients with persistent lymphadenopathy to guide further staging and management.

ACKNOWLEDGEMENT

I confirm that I have obtained full consent from the patient to use his clinical details for educational and publication purposes. This report was prepared with the assistance of artificial intelligence for language enhancement only; all medical content and interpretation are based on the original clinical findings

REFERENCES

[1]. Gaddey, H. L., & Riegel, A. M. (2016). Unexplained Lymphadenopathy: Evaluation and Differential Diagnosis. *American family physician*, *94*(11), 896–903. Link - https://pubmed.ncbi.nlm.nih.gov/27929264/

[2]. Bassiouni, M., Kang, G., Olze, H., Dommerich, S., & Arens, P. (2021). The diagnostic yield of excisional biopsy in cervical lymphadenopathy: A retrospective analysis of 158 biopsies in adults. Ear Nose & Throat Journal, 102(10), 645–649. https://doi.org/10.1177/01455613211023009

[3]. Kaseb, H., & Babiker, H. M. (2023, June 26). Hodgkin lymphoma. StatPearls - NCBI Bookshelf. https://www.ncbi.nlm.nih.gov/books/NBK499969/#:~:text=Hodgkin%20lymphoma%C2%A0is%20a%20rare%20malignancy,is%20as%20follows%3A%20nodular%20sclerosis

[4]. Wang, H., Balakrishna, J. P., Pittaluga, S., & Jaffe, E. S. (2018). Diagnosis of Hodgkin lymphoma in the modern era. *British Journal of Haematology*, *184*(1), 45–59. https://doi.org/10.1111/bjh.15614

[5]. Sakr, M. (2016). Cervical: lymphadenopathy. *Pubmed*, 163–190. https://doi.org/10.1007/978-3-319-27532-1_8

[6]. Kaseb, H., & Babiker, H. M. (2023, June 26). *Hodgkin lymphoma*. StatPearls - NCBI Bookshelf. https://www.ncbi.nlm.nih.gov/books/NBK499969

[7]. Küppers, R., 1. (2025). Advances in Hodgkin lymphoma research. In *Trends in Molecular Medicine* (Vol. 31, Issue 4, pp. 326–326). https://doi.org/10.1016/j.molmed.2024.10.004

[8]. Mottok, A., & Steidl, C. (2018). Biology of classical Hodgkin lymphoma: Implications for prognosis and novel therapies. Blood, 131(15), 1654–1665. https://doi.org/10.1182/blood-2017-09-772632

[9]. Maheshwari, A., Padhy, R. K., & Dash, B. K. (2015). A CLINICOPATHOLOGICAL STUDY OF CERVICAL LYMPHADENOPATHY. *Journal of Evolution of Medical and Dental Sciences*, *04*(19), 3497–3507. https://doi.org/10.14260/jemds/2015/504