# Benign Paratesticlar Cyst - A Mysterical Finding

<sup>1</sup>Dr. Dhairya Shah; <sup>2</sup>Dr. Jatin Bhatt; <sup>3</sup>Dr. Jayendra Vagadia; <sup>4</sup>Dr. Pratik Dash; <sup>5</sup>Dr. Swapnil Tolia; <sup>6</sup>Dr. Hiral Chaudhary PDU Hospital, Rajkot

Abstract:- Scrotal swellings are very common finding we witness in a surgical department. Rarely manifested as scrotal swellings are para testicular swellings which actually arise from the surroundings of testis. They may mimic a tumour arising from testis clinically. Diagnosis is utmost importance to differentiate it and to know whether it is benign or malignant.

*Keywords:*- *Epididymis, Para Testicular Cyst, Para Testicular Tumors, Tunica Albugenia, Tunica Vaginalis.* 

## I. INTRODUCTION

Para testicular lesions arise from epididymis or spermatic cord and it's coverings. A wide variety of para testicular cysts and para-testicular tumors, though not common entity but may present as intra scrotal inguinal mass. Diagnosis and accurate identification and of these lesions is not easy in the pre- and intraoperative stages. Not many studies are available discussing about range of diseases in this area. Ultrasonography play a pivotal role in identifying consistency ,location ,nature of these lesions. Knowledge about these lesions, Intra-operative findings and reports of histomorphology and immunohistochemistry , play a vital role in diagnosis , prognosis and management in with para testicular masses.

### II. CASE REPORT

A 41 year old male presented with right scrotal swelling since 2 months which was insidious in onset and progressive in nature. Swelling was also associated with minimal pain over right side of scrotum. Physical examination reveals firm, nontender swelling not differentiated from right testis and can get above the swelling with no palpable cough impulse and negative transillumination test. USG shows shows 60x41mm size of well defined cystic lesion noted at right lateral margin of testis with few tiny nodes noted. Neoplastic etiology likely .CT Thorax suggests multiple small nodular opacities seen in lateral segment of right middle and lower lobe likely to be infective etiology. All biochemical investigations were normal. Beta-HCG, LDH Alpha-Feto protein were also found to be in normal ranges. As Radiological evidence more towards neoplastic etiology ; Surgical Intervention was planned and High Inguinal Orchidectomy was performed.



Fig 1 Preoperative Picture Of Right Testicular Swelling.



Fig 2 Gross Image of Dissected Right Testis

Histopathological examination was done and it suggests Benign Paratesticular cyst with mild chronic nonspecific inflammation with calcification. No malignancy or Koch's seen.

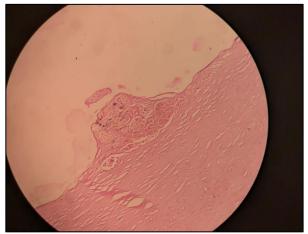


Fig 3 Flattened Epithelial Cells Seen of Tunica Albugenia .

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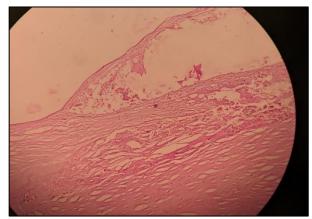


Fig 4 Cystic Fluid Seen Between the Epithelia

# III. DISCUSSION

The para-testicular region includes the contents of spermatic cord, the epididymis, testicular tunica and vestigial remnants (e.g., epididymis, testis and appendices)(1). Para-testicular region is made up of a variety of epithelial, mesothelial, and mesenchymal elements histologically(2).Neoplasms from para-testicular area consist of tumors with variety of behavioural patterns(3). Sometimes, a metastatic tumor can also occur in para-testicular region(4). Tumor-like proliferations or Pseudo-tumors and benign masses are seen in paratesticular structures. Awareness and knowledge about of these lesions can lead to better patient diagnosis and treatment. These tumours or cystic lesions are silent in symptoms, benign with or without detrimental outcomes presenting as a variable size swelling in the inguinoscrotal region. The global incidence is not more than 5% when considering all intra-scrotal lesions, out of which majority are not malignant. Prevalence of malignancy originating from paratesticular region is very less, ranging from 3% to 6%. Many Differential diagnosis are there for paratesticular lesions. Benign Tumors like, Lipoma, Hemangioma Adenomatoid tumor, Solitary fibrous tumor, Adenoma can Malignant category includes Mesothelioma, be there. Malignant fibrous histiocytoma, Atypical lipomatous tumor, Myxoid liposarcoma can be possible.Lesions which mimics tumors are periorchitis, , Tuberculous epididymitis, Filarial epididymitis, Mesothelial cyst, Epididymal cyst, Nonspecific granulomatous epididymitis(5). Our case was benign paratesticular cyst which include tunica albuginea and tunica vaginalis cyst. Cyst arising from tunica albugenia are most common paratesticular benign scrotal swelling. They resemble scrotal tunica cysts. Tunica albuginea cysts maximally presents at 40 years (might also be seen lately in the 5<sup>th</sup> and 6<sup>th</sup> decades). Tunica albuginea cysts are commonly palpable. They originates from tunica albuginea, a fibrous layer below the tunica vaginalis which encloses the testis. The exact etiology and pathogenesis of tunica albuginea cysts is still unknown but many reports says it arise from the mesothelia. These cysts are typical in its location.Usually found at the upper ,anterior and lateral aspect of the testis. Ultrasound is the prime modality for imaging of tunica albuginea cysts.In ultrasound these cyst are seen as an anechoic, approximately ~2-5 mm, well

demarcated, unilocular, sometimes multilocular, usually no solid structue, no erosion or invasion of the surrounding testicular tissue, rarely calcify, occasional milk of calcium or even a complex appearance.

#### IV. CONCLUSION

Paratesticular masses consists of a variety of malignant as well as benign lesions. Proper clinical examination with thorough radiological correlation is utmost important to differentiate these lesions. Awareness about this spectrum of diseases with meticulous clinical examination, radiology, immunohistopathological examination is very important in diagnosis of paratesticular diseases as this decides further line of therapy and ultimately prognosis of the patient.

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