VOLUME - 13, ISSUE - 08, AUGUST - 2024 • PRINT ISSN No. 2277 - 8160 • DOI : 10.36106/gjra

Original Research Paper

Plastic Surgery

A LARGE CUTANEOUS HORN ARISING FROM BURN SCAR ON ABDOMEN: A RARE CASE REPORT

Sharma Samira* Mch Plastic Surgery, Professor and Head, Department of Plastic Surgery, Government Medical College, Amritsar, Punjab, India. *Corresponding Author

Bhandari Naivedya MBBS intern, Department of Surgery, Adesh Institute of Medical Sciences and Research, Bathinda, Punjab, India.

ABSTRACT Cutaneous horns are the lesions that develop on the skin due to hyperkeratosis and resemble like an animal horn. They usually develop in the areas exposed to sun. This was a rare case of large cutaneous horn which developed over abdomen in the post burn scarred skin. The lesion was excised taking adequate margins. Histopathology examination supported the clinical diagnosis of cutaneous horn and no evidence of malignancy was found. Patient recovered uneventfully.

KEYWORDS : Burn scar, Cutaneous horn, Excision

INTRODUCTION:

Cutaneous horns are the lesions that develop on the skin due to hyperkeratosis. The term cutaneous horn was coined because of its resemblance to an animal horn [1]. These lesions are as a result of some underlying process which may be benign, premalignant or malignant with incidences of 61.1%,23.2% and 15.7% respectively [2]. They are mostly seen on the sun exposed parts of the body [3]. There are only few reports of these lesions arising from the burn scar [3,4,5].

Case Presentation:

We describe a case of 32 years old male patient who presented with a hard horn like growth on the right lumbar region for last 6 years. This was gradual in onset, progressive, painless and fixed to the underlying skin. Patient had history of thermal burns over abdomen, back and both upper limbs in childhood about 20 years back. He was managed conservatively at a local hospital. In 2016 he underwent release of post burn contracture and split skin grafting of right axilla in our department. Patient reported for treatment because of the inconvenience caused by the large size of this lesion.

On examination there was a horn like growth on right lumbar region which was greyish white and brown coloured. This was 8 cm long and 4.5 cm x 3 cm wide at the base [Figures 1&2]. The surrounded skin was scarred with hyper as well as hypopigmentation.

A- anterior view **B-posterior view.**

Figure 1: Cutaneous horn in the burn scar over abdomen.

Under local anaesthesia using infiltration with 0.5% lignocaine and 1:200,000 adrenaline, an elliptical incision was made taking 6 mm margin [6] and lesion was excised. Due to post burn scarring primary closure was not possible. The plan was to do skin grafting in second stage once the histopathology report rules out malignancy or margins are clear in case of malignancy however wound contracted secondarily and healed with conservative management.

Figure 2: Excised Specimen Of Cutaneous Horn.

The histopathological examination showed epidermal hyperplasia, keratosis and confirmed the clinical diagnosis of cutaneous horn. No evidence of malignancy found.

DISCUSSION:

The earliest documented case of cutaneous horn was of Mrs Margret Gryffith, an elderly Welsh woman in London in 1588[7]. A case of giant cutaneous horn 22cm long, pedunculated, present on the back, and found verrucous in histopathology has been reported and claimed to be one of the largest [8]. Cutaneous horns are the rare lesions which develop from the most superficial layer of the skin. Cutaneous horns most commonly occur on the sun exposed parts. Only a few cases have been reported in the non-sun exposed parts and areas of post burn scarring [3,4,5].

They usually grow slowly over the years to decades as in our patient it grew slowly over a period of 6 years however rapidly growing cutaneous horn in a burn scar over the period of 8 months has been reported [9]. They are solitary, variable in shape, mostly yellowish white and vary in size from a few millimetres to many centimetres which can hide the underlying benign and malignant lesion [5]. In a study of 643 cutaneous horns 39% were from premalignant and malignant pathology [2] and this was a significant percentage to justify the excision with some skin margin. The premalignant and malignant lesions were found to be significantly associated with site of lesion (more on sun exposed areas) and geometry of lesion (wide base and low height to base ratio). It is well known that Squamous cell carcinoma may arise in an old burn scar, especially when the scar is unstable or the seat of chronic ulceration. The occurrence of both squamous cell carcinoma and cutaneous horn in the same burn scar has been reported [10].

The special feature of our case was that the size of cutaneous

horn was much bigger than all the reported cutaneous horns arising from burn scars [3,4,5,9,10]. The site of the cutaneous horn was abdomen which has never been reported in literature.

CONCLUSION:

Cutaneous horn can be considered as a rare complication of burn scar. The treatment is excision followed by histopathology examination to rule out malignancy.

Source Of Support: none

Conflicts Of Interest: none

Informed consent has been taken from the patient

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