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## BASOSQUAMOUS CARCINOMA – A CASE REPORT

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<p><b>Article Info</b>  <i>Received 15/11/2014</i>  <i>Revised 27/11/2014</i>  <i>Accepted 12/12/2014</i></p> <p><b>Key words:</b>                  Basosquamous carcinoma, aggressive, metastases.</p>	<p><b>ABSTRACT</b>                  Basosquamous carcinoma (BSC) is a rare epithelial tumor and a variant of basal cell carcinoma, with features of both basal cell carcinoma (BCC) and squamous cell carcinoma (SCC), locally aggressive and invasive type with risk of recurrences and distant metastases. Paucity of literature about BSC compelled us to report this case of a 63 year old male with basosquamous carcinoma in the middle third of the left side of the nose.</p>
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### INTRODUCTION

Basosquamous carcinoma (BSC) is a rare epithelial tumor, where in features of both Basal cell carcinoma (BCC) and Squamous cell carcinoma (SCC) are seen with or without a transition zone [1]. This tumor was first described by Beadles in 1894 in a case of rodent ulcer and it was better reported by MacCormac in 1910 in a series of rodent ulcers which showed features of basal cell and squamous cell tumours present side by side without a transitional zone.

There are various histopathological patterns of BCC owing to the pluripotent nature of basal cells. Features of BCC along with SCC are distinguishable histologically from other histological types of BCC, by the evidence of low differentiated to well differentiated types of keratinisation [2]. Most common sites of occurrence of BSC are head and neck, mainly involving areas like the nose, ear and periorbital areas. Compared to other types of basal cell carcinomas, BSC is highly aggressive like SCC, locally invasive and more likely to metastasize to distant places, namely lymph nodes, lungs, bone and skin. Perineural space invasion may be an indicator of aggressive disease [3].

### CASE REPORT

An elderly male aged about 63 years, presented with the raised, hyperpigmented lesion since 1 year and 7 months (Figure 1). Patient initially noticed a tiny, dark, raised lesion which gradually progressed to the present size. Lesion was asymptomatic in nature. Patient did not give any history of topical application or surgical procedures except few attempts of squeezing to get rid of the lesion which resulted in minimal bloody discharge.

Clinical examination revealed a solitary, ill defined, erythematous, scaly plaque with erosion at the lower margin, non-tender, measuring about 0.6x1.0 cm, and present over the left side of the middle third of the nose; 1 cm above the naso-labial fold. General systemic examination did not reveal any significant findings. Provisional diagnosis of basal cell carcinoma was made. Wide excision biopsy more than 2 mm margin was performed followed by reconstruction with bilobed flap. Histopathological examination of biopsy stained by H&E stain showed focal acanthosis and keratotic plugging in the epidermis and focal areas of disrupted basement membrane with spillage of tumor cells into the dermis (Figure 2).



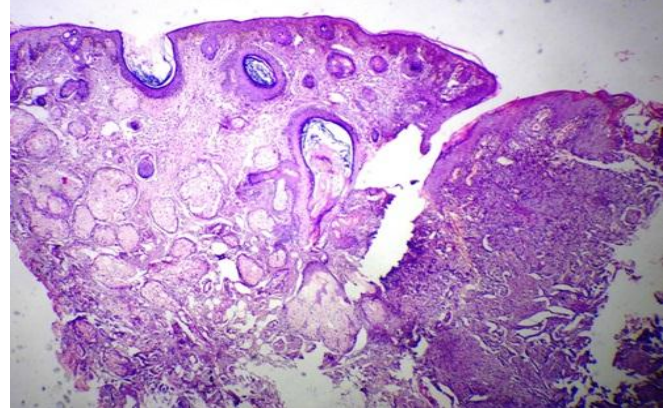
Multiple islands of invasive malignant tumor cells were seen within the dermis, exhibiting both basaloid and squamous differentiation with peripheral palisading of nuclei in the basaloid component and keratin pearls in

the squamoid component. The interface showed a few layers of intermediate differentiated spindle shaped squamoid cells (Figure 3,4,5&6). Based on these features, a diagnosis of Basosquamous carcinoma was made.

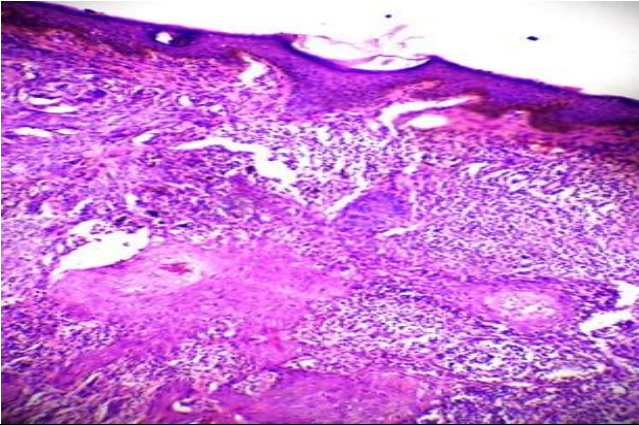
**Fig 1. Ill defined hyperpigmented plaque seen over the left middle of the nose**



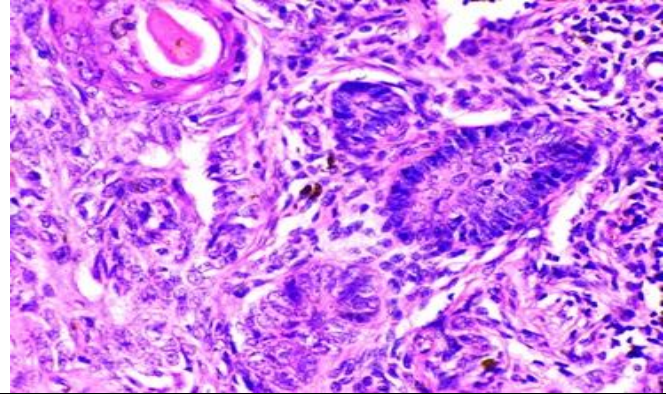
**Fig 2. The epidermis shows keratotic plugging and focal acanthosis. Focal areas with disrupted basement membrane and spillage of tumor cells. Invasive nests and sheets of tumor cells with squamoid and basaloid differentiation in dermis. [H&E 4x]**



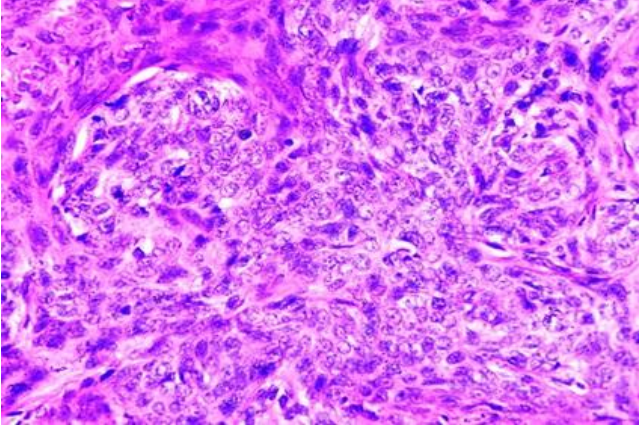
**Fig 3. Invasive nests of squamoid and basaloid tumor cells in the dermis [H&E 10x]**



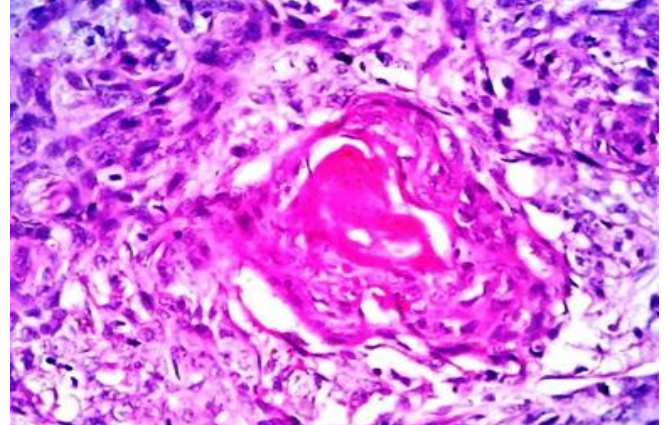
**Fig 4. Invasive islands of basaloid component with peripheral palisading and Squamoid tumor cells with moderate amount of keratinized cytoplasm [H&E 40x]**



**Fig 5. Diffuse admixture of basaloid and squamoid tumor cells [H&E 40x]**



**Fig 6. Keratin pearl of squamoid component. [H&E 40x]**



## DISCUSSION

Non-melanoma skin cancers are mainly classified as BCC and SCC, depending upon their biological behaviour. When BCC presents with intermediate histological features varying from one microscopic field view to another, showing squamoid differentiation of BCC with or without transition zone, it is called Basosquamous carcinoma. BSC is clinically indistinguishable from BCC and diagnosis is possible only by an accurate histological evaluation of specimens. The aggressive nature of BSC shows both haematogenic and lymphogenic metastasis [4]. BSC is considered as one of the histological subtypes of BCC characterized by high proliferative activity, propensity for local destruction, lymph node involvement and distant metastasis [5].

The incidence of BSC among BCC is 3% [5]. Risk factors are male sex, fair skinned people, acute episodes of intense burning on sun exposure especially UVB rays is harmful than cumulative life time exposure.

Clinically ill-defined lesions, involvement of centropalpebral area like periocular, nasal, ears, lips and presence of histopathological features of keratinization portend an aggressive and recurrent nature of disease.

Histopathologically, different opinions present about their origin; de novo or from differentiation of pre-existing BCC to squamoid form with poorly

differentiated to well differentiated components [6]. Accuracy of diagnosis is low because of its slow growing nature and small size of the specimen.

BSC being an infiltrative aggressive carcinoma, merges into different morphology like squamoid, spindled or squamous pearls without well demarcated foci of typical SCC. Transition zone may be seen with abrupt appearance of intermediate cells where feature of cells are between that of BCC and SCC [1].

Complete resection with wide surgical margins is essential. Long term follow-up for the detection of local recurrence and distant metastatic spread is recommended [7]. BSC is an ideal lesion for Mohs micrographic surgery, since face requires tissue conservation and being the site with a high risk of recurrences [1,8]. As there is no single histochemical test which confirms basal cell component and squamous cell component of the BSC. However the combination of CK1, CK7 and CK14 with BerEP4, identified 73% of BSC and 88% of SCC component.

## CONCLUSION

Since there is paucity of literature, we are reporting this case for its absolute rarity, aggressive behavior and invasive nature than other BCCs with distant metastasis.

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