

## Melanoacanthoma of External Ear: Report of Two Cases

Rashmi Patnayak, Amitabh Jena<sup>1</sup>, Amit Kumar Chowhan,  
Nandyala Rukmangadha, Mandyam Kumaraswamy Reddy

Departments of Pathology, and <sup>1</sup>Surgical Oncology, Sri Venketeswar Institute of Medical Sciences, Tirupati, Andhra Pradesh, India

**Address for correspondence:** Dr. Rashmi Patnayak, E-mail: rashmipatnayak2002@yahoo.co.in

### ABSTRACT

Melanoacanthoma is a rare lesion. Melanoacanthoma of external ear is still rarer. We present two cases of melanoacanthoma of external ear in adults which presented as pigmented growths and clinically were suspected as malignant lesions. Histopathology was diagnostic as it demonstrated the characteristic elevated lesion with abundant melanin pigment. No recurrence of the lesion was reported after four years of initial diagnosis. These cases have been presented because of their uncommon location, highlighting the differential diagnoses.

**Key words:** External ear, malignant melanoma, melanoacanthoma

### INTRODUCTION

Melanoacanthoma is a rare lesion resembling the usual seborrheic keratoses (SK), but in addition demonstrate abundant epidermal melanin pigment. So clinically they may be mistaken for malignant melanoma.<sup>[1]</sup> The term melanoacanthoma was introduced in the year 1960 by Mishima and Pinkus.<sup>[2]</sup> It is a painless, slow-growing, benign mixed proliferation of keratinocytes and melanocytes. Their common locations include the trunk and head, often on the lip or eyelid.<sup>[3-5]</sup> Only few cases of seborrheic keratoses in external ear have been described in world literature, melanoacanthoma being extremely rare.<sup>[6]</sup> Hereby, we present two cases of melanoacanthoma of external ear.

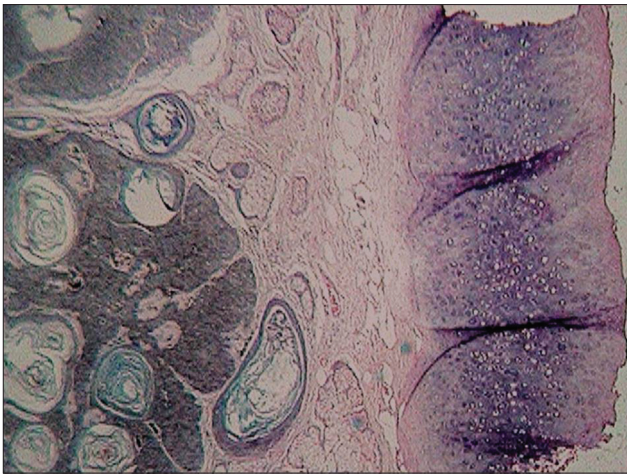
### CASE REPORT

A fifty year old female presented with slow growing, non pruritic, elevated and solid pigmented growth

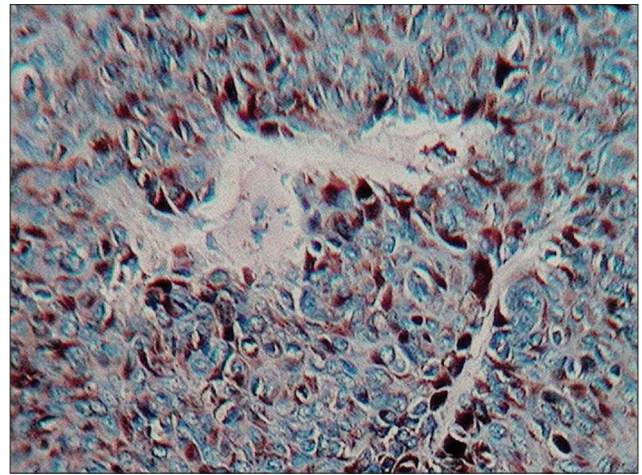
1.5 × 1 cm over the external ear noticed since last 1 year. Her general physical and systemic examination was within normal limits. The lesion was clinically suspected as melanoma. The histopathology of the excised specimen showed stratified squamous epithelium of the epidermis along with the elevated lesion with hyperkeratosis, acanthosis and papillomatosis. The spinous layer showed presence of round to oval cells and abundant brownish black pigment (melanin). In addition many horn cysts (both true and pseudo) were seen. There was no invasion of the surrounding tissue, lack of cellular atypia and infrequent mitoses. The dermis was unremarkable and a piece of cartilage of the concha was seen beneath it [Figures 1 and 2].

The second case was a 53 years old male who presented with similar type of pigmented lesion of 1 × 1 cm over external ear for past 1 and half year. Histopathologically there was presence of abundant melanin pigment containing cells in the spinous layer as seen in the previous case. In addition there were squamous eddies. Because of the clinical suspicion of malignancy and inadequate nature of the biopsy, repeat biopsy was advised. The second biopsy showed characteristic features of melanoacanthoma with adjacent normal epidermis. After 4 years of the initial diagnosis these 2 patients did not report any recurrence of the lesion.

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**Figure 1:** Epidermis showing acanthosis, horn cysts and abundant melanin pigment and underlying cartilage (H and E, x20)



**Figure 2:** Acanthotic epidermis with abundant melanin pigment (H and E, x40)

## DISCUSSION

Melanoacanthoma is considered to be a variant of seborrheic keratoses.<sup>[1]</sup> Patients of melanoacanthoma are usually adults beyond 40 years of age without any sex predilection. Melanoacanthoma has the same architecture as common seborrheic keratoses. In addition they possess plenty of dendritic melanocytes.<sup>[1,2]</sup>

Melanoacanthoma are seen both on the skin and on the oral mucosa. The lesion may present as a papule, plaque, cutaneous horn or nodule.<sup>[3,4]</sup> Though melanoacanthoma is usually described as a benign tumor of melanocytes and keratinocytes, but according to some authors it may be a reactive phenomenon induced by localized trauma. Patients are rarely symptomatic; however, trauma or manipulation may lead to bleeding or inflammation.<sup>[4]</sup> Histopathologically, 2 types of melanoacanthoma are described: Diffuse type and clonal type. In diffuse type which melanocytes are unevenly scattered throughout the lesion whereas in clonal type melanocytes and keratinocytes are clustered in small nests.<sup>[5,7]</sup> The present cases were of the diffuse type of melanoacanthoma.

Very few case reports of melanoacanthoma have been described in Indian literature in recent past.<sup>[1,5,8]</sup> Melanoacanthoma of external ear is rarely encountered.<sup>[6]</sup> We add these cases to the existing literature because of their rarity, uncommon location and because of their tendency to be confused with malignant tumors.

Since it may be confused with malignant melanoma or squamous cell carcinoma, histopathological examination is essential to arrive at the correct diagnosis. Melanoacanthoma because of their abundant pigment content may be confused with melanoma, particularly in inadequate biopsies. But

with adequate biopsy, the melanocytic nature of malignant melanoma with cytological atypia, frequent mitoses and invasion into surrounding tissue becomes apparent. Squamous cell carcinoma also can be entertained in the differential diagnosis especially in cases with a downward proliferation of the active epithelial cells. Here again the value of adequate biopsy is realised as adjacent normal epithelium and the elevated lesion gives clue for the diagnosis. So caution is advised before giving a report of malignancy in case of elderly patients. It should be correlated clinically and adequate biopsy should be advised in case of slightest discrepancy.

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