# MALIGNANT ACANTHOSIS NIGRICANS IN A 2 YEAR OLD CHILD WITH WILM'S TUMOUR

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Case report of a 2-year-old male child who developed acanthosis nigricans lesions of sudden onset and rapid spread is described. The child was diagnosed as having Wilm's tumour and the lesions of acanthosis nigricans subsided with resection of the tumour.

Key Words: Malignant acanthosis nigricans, Wilm's tumour

### Introduction

Acanthosis Nigricans (AN) is a symmetric eruption characterised by a hyperpigmented velvety cutaneous thickening that can occur on any part of the body, but characteristically affects the axillae, nape and side of the neck, the groins, antecubital and popliteal surfaces and umbilical area. The word acanthosis nigricans (acantho, from the Greek for thorn and nigricans, from the Latin, becoming black) was first proposed by Unna in 1890. Malignant AN secondary to an internal malignancy is of sudden onset and rapidly progressive, but is otherwise clinically indistinguishable from benign AN. It however often coexists with three other markers of internal malignancy: the sign of Leser Trelat, florid cutaneous papillomatosis and hyperkeratosis of the palms and soles.<sup>3</sup> We present here a case report of 2 year old male child who developed malignant AN lesions secondary to Wilm's tumour.

## **Case Report**

A 2-year-old male child presented to us with sudden eruption of symmetric, velvety, gray-brown to black coloured plaques of 10 days duration, involving the axillae, popliteal and antecubital fossae, groins, nape of the neck and regions around the umbilicus (Fig.1, 2). Patient's father had also noticed a swelling on the left side of abdomen of the child for 3 months.



Fig. 1 Acanthosis nigricans on the groins and thighs

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Fig. 2. Acanthosis nigricans on the back and popliteal fossae.

Biopsy confirmed the diagnosis of AN, while USG and CT scan abdomen showed abdominal swelling to be of Wilm's tumour. Other relevant investigations were normal, Wilm's tumour was surgically removed and skin lesions regressed within 2 weeks. The child, however was treated with topical corticosteroids during this period.

## Discussion

Malignant AN is usually secondary to an adenocarcinoma, commonly intra-ab-

dominal, most of which are of gastric origin. A plethora of other malignancies including lung, liver, uterus, breast, ovary, lymphomas and mycosis fungoides<sup>3</sup>, have been associated with malignant AN. Peptides produced by these tumours and insulin resistance have been implicated in its genesis.

The majority of affected patients of malignant AN are middle-aged and few case reports exist in children, Association of malignant AN with Wilm's tumour is very rare<sup>4.5</sup> and hence described.

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