

# Tree man Syndrome

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## Article Info

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## Abstract

Tree man syndrome is an extremely rare condition more formally known as Epidermodysplasia Verruciformis. Epidermodysplasia Verruciformis (EV, also called Lewandowsky–Lutz dysplasia), colloquially known as tree man illness is an extremely rare autosomal recessive genetic [1] hereditary skin disorder associated with a high risk of carcinoma of the skin. It is characterized by abnormal susceptibility to human papillomaviruses (HPVs) of the skin [2]. The resulting uncontrolled HPV infections result in the growth of scaly macules and papules, particularly on the hands and feet. It is typically associated with HPV types 5 and 8, [3] which are found in about 80% of the normal population as asymptomatic infections, [4] although other types may also contribute [3].

The condition usually has an onset of between the ages of one and 20, [5] but can occasionally present in middle age [5]. It is named after the physicians who first documented it, Felix Lewandowsky and Wilhelm Lutz (de) [6].

**Keywords:** Infections; Tree man; Syndrome; Epidermodysplasia; Scaly macules and papules.

### Causes

The cause of the condition is an inactivating PH mutation in either the EVER1 or EVER2 genes, which are located adjacent to one another on chromosome. These genes play a role in regulating the distribution of zinc in the cell nuclei. Zinc is a necessary cofactor for many viral proteins, and the activity of EVER1/EVER2 complex appears to restrict the access of viral proteins to cellular zinc stores, limiting their growth [7].

### Signs and Symptoms

Clinical diagnostic features are lifelong eruptions of pityriasis versicolor-like macules, flat wart-like papules, one to many cutaneous horn-like lesions, and development of cutaneous carcinomas [8].

Patients present with flat, slightly scaly, red-brown macules on the face, neck, and body, recurring especially around the penial area, or verruca-like papillomatous lesions, seborrheic keratosis-like lesions, and pinkish-red plane papules on the hands, upper and lower extremities, and face. The initial form of EV presents with only flat, wart-like lesions over the body, whereas the malignant form shows a higher rate of polymorphic skin lesions and development of multiple cutaneous tumors. Generally, cutaneous lesions are spread over the body, but some cases have only a few lesions which are limited to one extremity [9,10].

## Treatment

No curative treatment against EV has been found yet. Several treatments have been suggested, and acitretin 0.5–1 mg/day for 6 months' duration is the most effective treatment owing to anti proliferative and differentiation-inducing effects.

Interferons can also be used effectively together with retinoids. Cimetidine was reported to be effective because of its depressing mitogen-induced lymphocyte proliferation and regulatory T cell activity features. A report by Oliveira et al. showed that cimetidine was ineffective. Hayashi et al. applied topical calcipotriol to a patient with a successful result.

As mentioned, various treatment methods are offered against EV; however, most importantly, education of the patient, early diagnosis, and excision of the tumoral lesions take preference to prevent the development of cutaneous tumors.

## Case Report

A young Bangladeshi girl with bark-like growths on her face could be the first female afflicted by “tree man” syndrome, doctors studying the rare genetic condition. Sahana Khatun, 10, has growths on her chin, ear and nose, but doctors at Dhaka’s Medical College hospital are still conducting tests to establish if she has the unusual skin disorder.

Fewer than half a dozen people worldwide have epidermodysplasia verruciformis but none so far have been women, said Samanta Lal Sen, the head of the hospital’s burn and plastic surgery unit. “We believe she is the first woman,” Sen said.



Sahana Khatun



Abul Bajandar

Huge growths weighing five kilogrammes (11 pounds)

each had consumed the hands of 27-year-old Abul Bajandar, the first recorded Bangladeshi to be suffering from the disease.

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