

## Verruca plana following eyebrow threading

Sir,

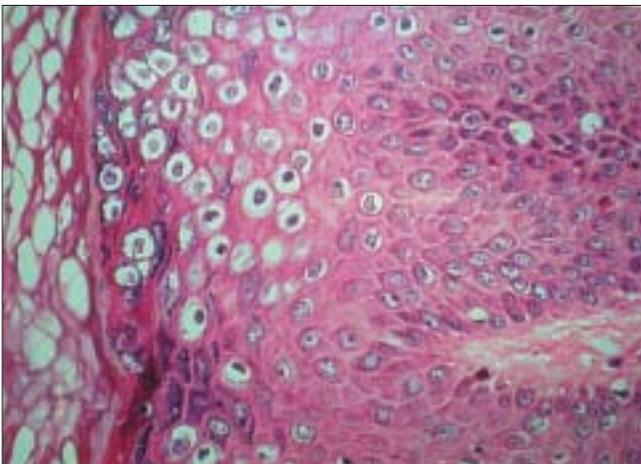
Human papillomavirus (HPV) type 3 most often and, less often, types 10, 27 and 41 cause flat warts.<sup>[1]</sup> This wart presents most typically as 2–4 mm flat-topped papules that are slightly erythematous or brown on the pale skin and hyperpigmented on darker skin. They are generally multiple, and are grouped on the face, neck, dorsa of the hands, wrists or knees.<sup>[1]</sup> In rare instances, there is extensive involvement with lesions also on the extremities and the trunk.<sup>[2]</sup> Hyperpigmented lesions occur and, when minimally elevated, they may be confused with lentigenes or ephelides. Of all clinical HPV infections, flat warts have the highest rate of spontaneous remission.

A 42-year-old lady presented with multiple pigmented, non-itchy, papular lesions that were well distributed along the line of both the eyebrows for the last 2 months. The size of the papules ranged from 2 to 5 mm. There was a definite history of threading of the eyebrow. The lesions mostly corresponded to the area of the skin where threading had been performed over the eyebrow [Figure 1]. No similar lesions were seen in the other parts of the body. A clinical diagnosis of verruca plana (along the lines of threading) was made.

Histopathological examination showed hyperkeratosis of a loose lamellar type, acanthosis without papillomatosis and slight elongation of the rete ridges, but no area of parakeratosis. Numerous vacuolated



**Figure 1: Verruca plana following eyebrow threading**



**Figure 2: Histomicrograph showing hyperkeratosis of loose lamellar type, acanthosis without papillomatosis or parakeratosis. Numerous vacuolated cells lie in the upper stratum malpighii including granular layer. The horny layer had a pronounced basket-weave resulting from the vacuolization of the horny cells (H & E, x200)**

cells were present in the upper stratum malpighii, including the granular layer. The horny layer had a pronounced basket-weave appearance resulting from the vacuolization of the horny cells [Figure 2].

Verruca plana may develop in men who shave their beards and in women who shave their legs. This is a result of autoinoculation of the HPV. A useful finding is the tendency of the warts to koebnerize, forming linear, slightly raised papular lesions.<sup>[1]</sup> Multiple warts are reported that develop after tattooing and remaining exclusively confined to that area.<sup>[3]</sup> The latent virus has the ability to induce wart after cutaneous ultraviolet exposure.<sup>[3]</sup> Appearance of warts at the site of threading is an unusual phenomenon.<sup>[4]</sup>

Kumar *et al.*<sup>[4]</sup> reported two such cases, the first as Koebnerization from the initial lesion elsewhere on the patient's body, and the second possibly from the infected material at the beauty parlour. In our case, appearance of verruca plana is due to use of infected material at the beauty parlour followed by Koebnerization.

Thus, beauty parlour personnel should neither reuse the thread during threading nor use the same towel on multiple clients. Moreover, they should properly sterilize the instruments (scissors and forceps) used for threading and facials to avoid this cross infection. We report this case for its rarity.

**Saswati Halder, Atin Halder<sup>1</sup>**

Departments of Dermatology, <sup>1</sup>Gynaecol and Obstet, North Bengal Medical College and Hospital, P.O – Sushrutanagar, District– Darjeeling-734 032, India

**Address for correspondence:**

Dr. Saswati Halder, 7, Swamiji Sarani, Hakimpara, Siliguri – 743 001, Darjeeling W. B., India.  
E-mail: drsaswati\_h@yahoo.co.in

**DOI:** 10.4103/0378-6323.48679 - **PMID:** 19293519

## REFERENCES

1. Odom RB, James WD, Berger TG. Andrew's diseases of the skin. 9<sup>th</sup> ed. Philadelphia: W.B.Saunders 2000. p. 473-525.
2. Xu X, Erickson LA, Elder DA. Diseases caused by viruses In: Elder DE, Elenitsas R, Johnson BL Jr, Murphy GF, editors. Lever's histopathology of the skin. 9<sup>th</sup> ed. Philadelphia: Lippincott Williams and Wilkins 2005. p. 661-79.
3. Brajac I, Loncarek K, Stojnic- Sosa I, Gruber F. Delayed onset of warts over tattoo mark provoked by sunburn. J Eur Acad Dermatol Venereol 2005;19:247-83.
4. Kumar R, Zavar V. Threading warts: A beauty parlour dermatosis. J Cosmet Dermatol 2007;6:279-82.