# Dermatology

# Original Research Paper



## ACNE NECROTICA: A CASE REPORT AND REVIEW OF LITERATURE

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**ABSTRACT** 

Acne necrotica is a condition characterized by the repeated appearance of inflammatory papules and papulo-pustules which are prone for rapid necrotization leading to varying degree of varioliform scars. In this article we report a case of acne necrotica along with a review of literature.

KEYWORDS: Inflammatory, papules, papulo-pustules, necrotization, varioliform scars, acne necortica

#### INTRODUCTION:

The term acne necrotica was first proposed by Sir. Basin in the year 1851<sup>1</sup>. It was named acne necrotica varioliformis by Sir. Hebra due to the presence of round depressed scars seen in the active form of the disease. In 1920's – 1930's Sir. Sabouraud and Sir. Lane described an entity called acne necrotica miliaris (pruritic, pinpoint pustules on the scalp) which is thought to be a minor variant of scarring varioliform variant of acne necrotica. Acne necrotica is aka. Acne frontalis, acne atrophica, necrotizing lymphocytic folliculitis or pustular perifolliculitis<sup>2,3</sup>. This disease is characterized by the repeated appearance inflammatory papules, papulo – pustules which are prone for rapid necrotization leading to varying degree of varioliform scars.

### Case Report:

A 33yr old male patient presented to the OP with complaints of burning sensation and pruriginous multiple raised solid lesions associated with scarring over the face for the past 4 months.

There is no history of pain. Initially solid lesions started appearing on the patient's forehead, cheeks and chin following itching and burning sensation. The onset was insidious and few of the lesions gradually progressed into nodulocystic lesions. The patient gives a history of scratching over the lesions leaving behind deep scars. There is no history of similar complaints in the past. There is no history of similar complaints in the family.

# On examination:

Multiple papules and papulo-pustules, mostly umbilicated present over the patient's forehead, cheeks, chin and preauricular area. Depressed varioliform scars distributed over the cheeks, chin, preauricular area and the auricle. Excoriation marks are present over both the cheeks and lobule of the ear (Figure 1).

General, ocular, musculoskeletal and CNS examination was within normal limits. Epidermal spongiosis and lymphocytic exocytosis, dense diffuse lymphocytic infiltrate and necrosis in the dermis were observed on histopathological examination of skin biopsy that is consistent with acne necrotica.

The patient was managed symptomatically with topical antibiotics and systemic retinoids.



Figure 1 shows multiple papules and papulo-pustules mostly umbilicated present over the patient's forehead, cheeks and chin and depressed varioliform scars distributed over the cheeks and chin.

#### DISCUSSION:

Acne necrotica better known as necrotizing lymphocytic folliculitis is an acquired disorder of the pilosebaceous unit characterized by chronic scarring and necrotizing inflammation of the area involved. It is said to be a clinically distinctive form of cicatricial alopecia. It is a rare condition. Females are comparatively more predisposed to this condition than males and starts in the fourth or fifth decades of life<sup>3,4</sup>. It is said to aggravate in summers. It is said to be caused by microorganisms like Staphylococcus aureus and Propionibacterium acnes. The pathophysiology of acne necrotica has not been very well established but in most of the patients an abnormal inflammatory reaction to the above mentioned organisms has been noted. The clinical presentation of acne necrotica includes grouped erythematous papules, papulo-pustules 2-5 mm in diameter, most of them having a central umbilication later on followed by central necrosis in a few days which sheds in 3-4 weeks forming varioliform scars<sup>2,5</sup>. It is sometimes associated with

burning sensation or pruritis or both. The most commonly predisposed sites are frontal scalp, upper forehead, the nape of neck, the nose, cheeks and rarely chest and back. Mechanical manipulations like rubbing and scratching can exacerbate this disease 3.6. There are multiple differentials for acne necrotica like bacterial folliculitis, tinea capitis, eczema herpeticum, folliculitis decalvans, eosinophilic pustular folliculitis, pyoderma gangrenosum, cicatricial pemphigoid, blastomycosis-like pyoderma, erosive candidiasis of the scalp and pustular erosive dermatosis of the scalp. Histopathological examination shows dyskeratotic epithelium with associated spongiosis, lymphocytic perifollicular and perivascular infiltrate, as the lesion progresses necrosis involving the epidermis and dermis appears. Bacteria are often seen in stratum corneum. Culture to establish the presence of the causative organisms can be done. The patient can be treated by prescribing systemic and topical antibiotics, oral isotretinoin, systemic and intralesional corticosteroids, topical benzoyl peroxide, topical calcipotriol cream.

## **CONCLUSION:**

Acne necrotica is a rare and an under recognized entity prone for varying degree of varioliform scars which can be hard to treat, hence timely intervention is necessary in order to prevent this.

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