Hidradenitis Suppurativa (Hurley I/II): Serial Excisions with Primary Wound Closure Under Local Anesthesia As Most Adequate Treatment Approach!

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Abstract

BACKGROUND: Acne inversa as a chronic inflammatory disorder can be divided into three stages according to Hurley’s classification. It affects the axillary and anogenital region predominantly, and its chronic course of development is associated with a major negative impact on quality of life, especially in young patients. We discuss the different types of treatment in patients with acne inversa and the benefits of two-stage surgical treatment by serial excisions with primary wound closure under local anaesthesia.

CASE REPORT: We present a 28-year-old man with hidradenitis suppurativa stage I in the right axillary region and also in the pubic area. The patient is an active smoker. The patient was treated with Rifampicin 2x 300mg / day without any particular effect and preoperatively, systemic therapy with Clindamycin 4x 600mg / day was performed, combined with daily dressings with jodasept ointment for 7 days. The patient was treated through two surgical sessions under local anaesthesia with elliptical excision of the lesions located in the right axillary and the pubic area. Both of the two surgical defects were initially closed with single interrupted sutures. Histological examination of both lesions revealed the presence of suppurative folliculitis.

CONCLUSION: The literature describes various methods for treating acne inversa which include both systemic and local approaches. However, it is considered that drug therapy achieves only a temporary improvement in patients with hidradenitis suppurativa. For this reason, the surgical treatment of acne inversa is indicated as the only curative treatment, especially for recurrent lesions and serial excisions under local anaesthesia, followed by primary wound closure is a valuable treatment for patients with mild to moderate HS (Hurley stage I & II).

Introduction

Acne inversa (AI) (Hidradenitis suppurativa (HS)) is a chronic inflammatory disorder of the apocrine glands, which usually affects the axillary and anogenital region [1]. The main problem with this disease is the chronic course of development with a major negative impact on quality of life and significant co-morbidity in the cases of severe acne inversa (secondary lymphedema, hypertension, diabetes mellitus type II, obesity, metabolic syndrome and others) [1].

According to Hurley’s classification, hidradenitis suppurativa can be divided into three clinical stages: Stage I: abscess formation, single or multiple without sinus tracts and scarring; Stage II: recurrent abscesses with sinus tracts and scarring; single or multiple widely separated lesions; Stage III: diffuse or almost diffuse involvement or multiple interconnected tracts and abscesses [2].

Case Report

We present a 28-year-old man in good overall condition. The patient is an active smoker for 14 years (1 box per day). For several years, an acne inversa has been diagnosed. The patient was hospitalized for the surgical treatment of hidradenitis suppurativa within two surgical sessions. During the dermatological examination in the right axillary region and the pubic area the presence of erythema nodules filled with purulent content, clinically defined as hidradenitis suppurativa stage I, was established (Figure 1a, 1b, and 2a). In the right axillary region,
post-inflammatory hyperpigmentations and a scar of surgical intervention performed in the past were observed (Figure 1a, and 1b).

Post-inflammatory hyperpigmentations were also observed in the pubic area (Figure 2a). The patient was treated with Rifampin 2 x 300 mg/day without any particular effect. Preoperatively, systemic therapy with Clindamycin 4 x 600 mg/day was performed, and dressings with jodasept ointment were applied topically for 7 days. In the first operative session, an elliptical excision was performed under local anesthesia of the lesion located in the right axillary region (Figure 1b, and 1d). The surgical defect was primarily closed with single interrupted sutures (Figure 1e). A sterile bandage with jodasept ointment was made. The subsequent histological examination revealed the presence of suppurative folliculitis. In the second stage, an elliptic excision of erythema nodule in the pubic area was performed again under local anesthesia with lidocaine (Figure 2b, and 2c). The occurred surgical defect was initially closed with single interrupted sutures (Figure 2d). Histological data was again about hidradenitis suppurativa. A smooth postoperative period was observed without complications and perfect cosmetic results.

**Discussion**

Treatment of acne inversa includes several basic options-topical options, systemic options and surgical methods, including laser therapy [1], [3]. About drug therapy, long-term antibiotics (clindamycin, rifampicin) or acitretin monotherapy, antiandrogens, tumour necrosis-α inhibitors (TNFαI)

may be used, which may lead to improvement in milder cases of AI, but they are not curative [1], [3], [4].

It is believed that treatment with antibiotics or anti-inflammatory drugs such as prednisone or TNF-alpha-inhibitors usually achieves only temporary improvement and patients with advanced AI treated by combinations of antibiotics need up to 12 months before some of them achieve a temporary remission [1], [4]. As HS has a follicular pathogenesis Lasers and intense pulsed light (IPL) treatment have been found useful by reducing the numbers of hairs in areas with HS [5]. However, according to some authors, as we think, surgery should be introduced earlier in the management of acne inversa [6]. Furthermore, according to the literature, surgical intervention is considered as the only curative treatment for recurrent lesions, and for patients with mild to moderate HS (Hurley stage I & II), local excision followed by primary closure is a valuable treatment with low morbidity and a high patient satisfaction rate [4]. The risk of long-term signs of recurrence, most often near the surgical field, should be noted in surgical excisions under local anesthesia (mainly wide excisions for Hurley Stages II to III) [7].

In conclusion, based on the results of our patient, we support the thesis that, for mild to moderate cases of hidradenitis suppurativa, serial excisions under local anesthesia should be considered as first-line therapy.
References


