

antes da cardioversão, já se verificava hipoxémia em agravamento.

Finalmente, a hipótese de toxicidade pulmonar aguda (TPA) pela amiodarona parece-nos atendível face à evidência encontrada. As descrições são raras, com mortalidades elevadas, dado o agravamento respiratório ser tardiamente imputado ao fármaco.<sup>3</sup> Contrariamente à toxicidade crónica, o conhecimento fisiopatológico da TPA pela amiodarona é limitado e associa-se à ausência de critérios claros de diagnóstico, inespecificidade de alterações radiológicas e laboratoriais, bem como à carência de terapêuticas validadas.<sup>5</sup> As primeiras manifestações habitualmente ocorrem dentro das primeiras 24h, sendo o diagnóstico quase sempre de exclusão.<sup>2,4</sup> Embora já regressivas, as alterações radiológicas encontradas em vidro despolido de localização periférica foram já relatadas como achado precoce habitual<sup>1</sup>. Estas alterações podiam ser passíveis de enquadramento em fenómeno infeccioso ou hidrostático, embora não tenha existido suporte para estas alternativas.

A TPA pela amiodarona apresenta-se mais comumente como LPA/SDRA (com correlato histológico de dano alveo-

lar difuso) ou, mais raramente, como pneumonia organizativa ou hemorragia alveolar difusa.<sup>2-5</sup> O mecanismo lesional é impreciso envolvendo, porém, uma resposta inflamatória difusa ou por efeito tóxico directo, sob acção de radicais livres de oxigénio e acumulação fosfolipídica intra-celular, ou indirectamente por reacção de hipersensibilidade.<sup>3-5</sup>

Neste caso, a consideração precoce desta possibilidade diagnóstica e a intervenção terapêutica imediata com CPAP foram provavelmente determinantes no seu desfecho favorável, impedindo a progressão completa para SDRA e a necessidade de intubação oro-traqueal e ventilação invasiva.

#### CONFLITO DE INTERESSES

Os autores declaram a inexistência de conflitos de interesse.

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## Buschke-Lowenstein Tumor

### Tumor de Buschke-Lowenstein



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#### ABSTRACT

**Introduction:** Giant condyloma acuminatum belongs to a spectrum of diseases with malignant degeneration. Clinically, it presents as exophytic, fungating masses, sometimes with a cauliflower-like morphology.

**Case presentation:** We present a case of a 32-year-old female patient with a 180x95x80mm exophytic mass of the vulvar region suggestive of Buschke-Lowenstein Tumour. Treatment included wide local excision with electrosurgery and CO<sub>2</sub> vaporization of recurrent focal lesions. Histopathological analysis confirmed the expected diagnosis. Surgery went without complications and the patient is lesion-free at the 12<sup>th</sup> month of follow-up.

**Conclusion:** There is a lack of consistent trials regarding optimal treatment of BLT. Surgery, when feasible, remains the mainstay of treatment. It allows quick lesion size reduction, with fewer side effects and more rapid return to daily living activities, when compared to other treatment options.

#### RESUMO

**Introdução:** Os Condilomas acuminados gigantes pertencem a um grupo de doenças com degenerescência maligna. Clinicamente apresentam-se como massas exofíticas, volumosas, com uma morfologia semelhante a couve-flor.

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**Caso Clínico:** Apresentamos o caso de uma doente com 32 anos, com uma massa vulvar exofítica com 180\*95\*80 mm, sugestiva de tumor de Buschke-Lowenstein (TBL). O tratamento incluiu ampla excisão local com recurso a electrocirurgia e vaporização com laser CO<sub>2</sub> nas lesões focais recorrentes. O exame histopatológico confirmou o diagnóstico sugerido. A cirurgia decorreu sem complicações e a paciente encontra-se no 12º mês de follow-up, livre de lesão.

**Conclusão:** Não existem muitos estudos consistentes em relação ao tratamento ideal do TBL. A cirurgia, quando exequível, continua a ser o pilar do tratamento. Permite uma rápida redução do tamanho da lesão, com poucos efeitos colaterais e um regresso mais rápido às actividades da vida diária, quando comparada com outras opções de tratamento.

## INTRODUCTION

Giant condyloma acuminatum, also known as Buschke-Lowenstein tumor (BLT), was first described by Buschke and Löwenstein in 1925.<sup>1-3</sup> It is a slow-growing, locally destructive tumour of the ano-genital region and it is thought to be induced by human papillomavirus (HPV), most commonly HPV types 6 and 11 and occasionally types 16 and 18.<sup>1-4</sup> Rarely, with an estimated incidence of 0.1% in the general population, it is sexually transmitted.<sup>2-3</sup> BLT belongs to a spectrum of diseases with malignant degeneration.<sup>3-5</sup> Even though BLT has a histologically benign appearance, it clinically behaves in a malignant fashion, destroying adjacent tissues. It is as an intermediate entity between an ordinary condyloma acuminatum and squamouscell carcinoma (SCC).<sup>[3-??9 confirmar referência]</sup> Clinically, it presents as exophytic, fungating masses, sometimes with a cauliflower-like morphology.<sup>3-5</sup> Diagnosis of verrucous carcinoma may be difficult because of the lack of cytological features of malignancy and particularly if biopsy specimen involves only the surface epithelium. Large and deep biopsies, careful sectioning and complete histologic examination are mandatory.<sup>3-5</sup> Histologically, it differs from other lesions by its thick stratum corneum, marked papillary proliferation, tendency to deep invasion, with displacement of surrounding tissues. Similar features are also seen in verrucous carcinoma. As distinction between verrucous carcinoma and BLT is difficult, BLT is often regarded as a variant of verrucous carcinoma.<sup>4,5</sup>

## CASE PRESENTATION

A 32-year-old female patient, HIV positive for the last 5



Fig. 1 – Extensive verrucous, hyperkeratotic lesion in the vulvar region.

years, presented with an extensive verrucous, hyperkeratotic 180x95x80 mm lesion in the vulvar region (Fig.1), occupying the anterior fourchette and labia majora. She had complaints of perineal pain, foul smelling vaginal discharge and difficulty in walking, with 1 year of evolution. Clinical picture and histological examination led to the diagnosis of Gyant Condyloma Acuminatum or Buschke-Lowenstein Tumor (BLT). Computed tomography (CT) scan showed no local invasion, and HPV 11 was found on biopsy specimen with polymerase chain reaction-restriction fragment length polymorphism (PCR-RFLP). Biopsy also showed parakeratotic hyperparakeratosis, acanthosis and papillomatosis, without dysplasia.

She underwent wide local excision (total vulvectomy) using electrosurgery. Surgery went without complications. There was suture dehiscence in the immediate postoperative period, which healed by secondary intention. During follow-up, there was recurrence of focal lesions that were resolved with CO<sub>2</sub> laser vaporization. Histopathological examination confirmed BTL. She is now in the 12th month of follow-up and presents no residual lesions or recurrences (Fig.2).

## DISCUSSION

This case represents a very prolonged evolution in which the lesion bulky dimensions and the introverted profile of the patient, allowed disease progression to a debilitating size. After observation, surgical excision seemed the best option, since it allowed a rapid reduction in size, quick recovery and return to daily living activities, including a nor-



Fig. 2 – Follow-up after one year with no residual lesions or recurrences.

mal active sex life (until then neglected). Surgery was simple, without complications or side effects attributable to the treatment. The postoperative period was complicated with dehiscence, which would be expectable due to the size of tissue removed. Skin grafting was not an option because of the different characteristics of the tissues available with respect to the original and to a good prediction of the healing process. Recovery was rapid and favorable, with small recurrences being resolved on an outpatient basis, without impairment of patient quality of life. She now presents lesion-free, with frankly improved social life and self-esteem.

Buschke-Lowenstein tumor is classified as a verrucous carcinoma.<sup>3</sup> Most authors recommend the radical surgical excision, allowing a complete histological examination and assessment of tumor-free resection margins. Other adjuvant treatment such as laser, radiotherapy, intralesional interferon alfa or topic imiquimod may be considered to avoid mutilating surgical interventions.<sup>3</sup> Regular follow-up is needed because of the frequent recurrences and possible malignant transformation.

## CONCLUSION

Optimal treatment for BLT is being debated because of lack of consistent trials. In the case described, surgical option seemed to be the most appropriated. The large size of the tumour and its disabling nature (walking difficulty), demanded a quick resolution. Surgery proceeded without complications and the patient's rapid return to normal life was crucial to the success of the treatment. Surgical approach proved to be inexpensive and highly effective in this case, with sporadic and minimum recurrences which were solved with simple CO<sub>2</sub> laser vaporization.

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## CONFLICT OF INTERESTS

None stated.

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