

**Figure 2.** Schematic of the mechanism of the occurrence of right paraduodenal hernia. The proximal portion of the small bowel remains to the right, insinuating itself into the hernia recess, known as the Waldeyer fossa, posterior and inferior to the opening. That mobility can promote slippage of the loops, and in more severe cases, their strangulation.

which supply segments of the small bowel in the area of the hernia defect<sup>(3,5)</sup>. In the case described here, MDCT revealed laterally insinuated loops clustered in the region of the mesocolic fossa, with no significant distension or injury of the jejunal

loops. The addition of contrast could increase the diagnostic accuracy of the radiological examinations.

Laparoscopic repair is a safe and effective method for the management of cases of Broesike hernia<sup>(7,8)</sup>. However, because the patient described here was at prohibitive surgical risk, we opted for clinical monitoring. At this writing, the patient has been followed at our facility for over six months, without any worsening of her symptoms.

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**Thickening of the greater auricular nerve in leprosy: clinical correlation by ultrasound**

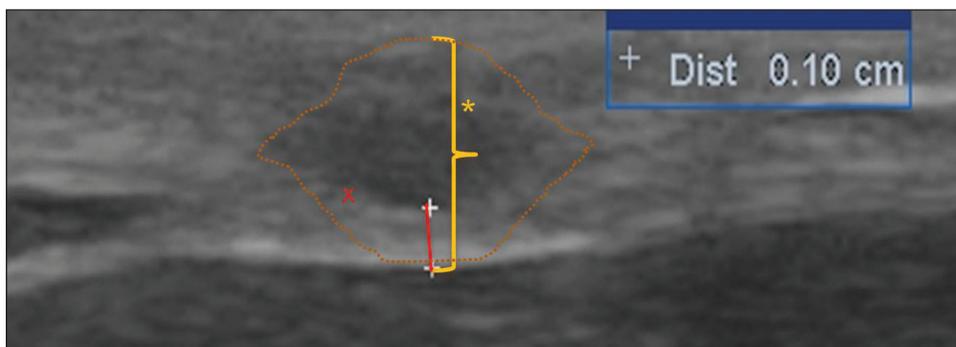
Dear Editor,

A 39-year-old man presented with a two-month history of painful erythematous-violet nodular lesions on his trunk and lower limbs, accompanied by arthralgia in the small joints of the hands, wrists, ankles, and elbows, with morning stiffness for about an hour that improved with movement. He reported having experiencing similar, self-limited episodes for the last year and

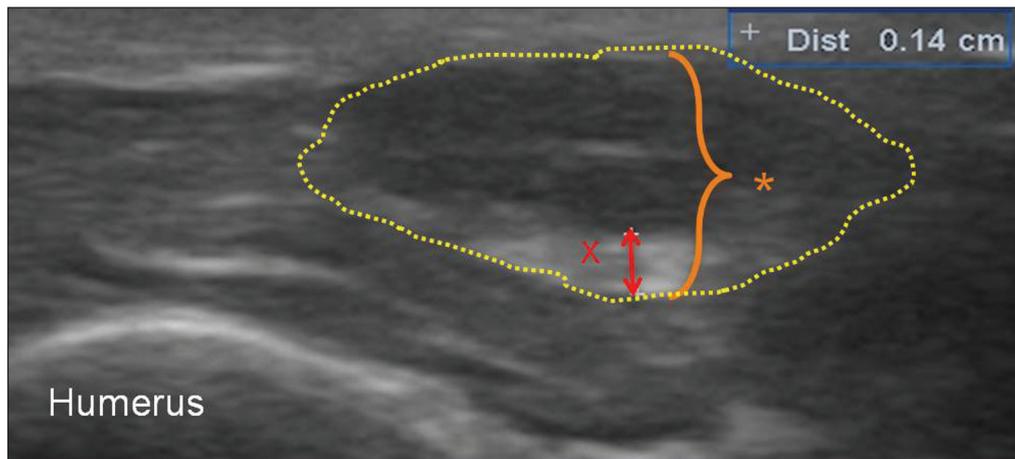
a half, each episode lasting for approximately five days and accompanied by significant weight loss. On physical examination, the patient was malnourished, with lamellar desquamation and mobile nodules of approximately 3 cm, together with erythematous-violet lesions on the anterior surface of thighs, just above the knees bilaterally and at the left thoracoabdominal junction. He also had gross thickening of the fibular and ulnar nerves bilaterally, as well as of the right greater auricular nerve (Figure 1). The diagnosis of lepromatous leprosy was confirmed by skin biopsy. We assessed the peripheral nerves by ultrasound (Figure 2).



**Figure 1.** Enlarged (thickened) right greater auricular nerve (arrows).



**Figure 2.** Ultrasound of the right greater auricular nerve (asterisk, with contours indicated by dotted lines), in an axial view, showing a hyperechoic rim, corresponding to the epineurium, with a thickness of 1.0 mm (red x). The cross-sectional area of the nerve was estimated to be 50 mm<sup>2</sup>.



**Figure 3.** Ultrasound of the left ulnar nerve (asterisk, with contours indicated by dotted lines), in an axial view, 20 mm above the elbow, showing thickening of the epineurium (red x), which had a thickness of 1.4 mm—much greater than the average (0.77 mm) and similar to the greatest thickness reported by Visser et al.<sup>(5)</sup>.

Ultrasound imaging of the peripheral nerves can be used in order to assess their morphology, identify thickening, estimate the thickness of the epineurium, and calculate their cross-sectional area, as well as to determine their echogenicity and (on Doppler ultrasound) vascularity<sup>(1–3)</sup>. The ulnar nerve is most often affected, followed by the median and fibular nerves<sup>(4)</sup>. However, to our knowledge, there have been no ultrasound studies assessing alterations in the greater auricular nerve, which is involved in 18% of cases<sup>(4)</sup>. In the case presented here, we were able to assess that nerve and found it to be enlarged, as shown in Figure 2. We also identified enlargement of the left ulnar nerve, at approximately 20 mm above the elbow (Figure 3), as was previously reported by Visser et al.<sup>(5)</sup>.

Despite the scarcity of data in the literature on specific quantification of thickening of the greater auricular nerve, we believe that this case illustrates the value of ultrasound in assessing the nerve. Although it is generally smaller than the ulnar nerve, the thickening parameters of the greater auricular nerve epineurium in our patient were similar to the cut-off points for the ulnar epineurium established in other studies<sup>(5)</sup>.

Leprosy is an endemic mycobacteriosis that has a broad clinical spectrum, characterized by nerve and cutaneous lesions with nerve thickening<sup>(1,5)</sup>, and is relatively common in Brazil. Several recent studies have proposed measuring nerve thickness with high-resolution ultrasound involving the use of high-frequency linear probes. That technique has provided a good evaluation of peripheral nerves<sup>(6)</sup>. An increase in the cross-sectional area of the nerve can thus be identified, providing an assessment of the degree of nerve damage, and the technique could be used in follow-up evaluations<sup>(2)</sup>. Here, we have reported the first case

in which ultrasound evaluation of the greater auricular nerve revealed its thickening in a patient with leprosy.

The use of ultrasound for determining nerve thickness could significantly improve early diagnosis of peripheral neuropathy in leprosy, because it can show the changes that occur even before nerve thickening is palpable or visible on clinical examination. A major goal of treatment is to prevent nerve damage, which progresses to cause physical disabilities<sup>(1,4)</sup>. In this context, the monitoring of leprosy patients through the use of bedside ultrasound evaluation is a quite useful tool.

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#### Osteomyelitis of the maxilla caused by *Actinomyces* sp.

Dear Editor,

We report the case of a 76-year-old female patient with diabetes and hypertension that were not being treated on a regular basis. She had undergone a tooth extraction, then continued to feel pain and had a persistent low fever, even during the course of oral antibiotic therapy. Over the following months, she lost multiple, contiguous, teeth at the previously manipulated site. Computed tomography for investigation of bone involvement showed soft-tissue density that was poorly defined, indicating bone erosion in the left maxilla, extending to the maxillary sinus, and palatal

fistula. A biopsy of the lesion showed mixed inflammatory infiltrate with granulation tissue (visualized with hematoxylin-eosin staining) and actinomycete colonies permeating the bone tissue (visualized with Grocott's staining), which allowed us to make a diagnosis of osteomyelitis caused by *Actinomyces* sp. (Figure 1).

Actinomycosis is a chronic suppurative infection caused by the Gram-positive bacillus *Actinomyces*, the species *Actinomyces israelii*, which is a member of the endogenous flora often found in the teeth, oropharynx, gastrointestinal tract, and female genital tract, being the most common agent in humans<sup>(1)</sup>.

The most commonly affected area is the cervicofacial region (in 50–65% of cases), followed by the thorax (in 15–30%)