

comparison with the landmark technique in critical care patients. *Crit Care*. 2006;10:R162.

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Mesh Does not Substitute for a Correct Technique, and Can Turn a Simple Procedure Into a Complex Disease With a Difficult Solution[☆]



Las mallas no suplen una técnica correcta, y pueden convertir un proceso sencillo en una enfermedad compleja de difícil solución

In the last decade, surgical mesh has become what is considered the ideal method for repairing hernias of any type. As their use has become routine, the surgical process has undergone changes in such a way that the mesh has taken the leading role in the procedure. Meanwhile, other steps that had been consolidated after years of experience and were considered essential for avoiding recurrences have been minimized or even forgotten altogether. These include: clear identification and dissection of the inguinal ligament, pubis and posterior floor; treatment of the sac; assessment of the internal inguinal ring; treatment of the cremaster; assessment of sliding over the pubis; etc.¹⁻³

To illustrate this situation, I present the case of a 65-year-old male, with no medical history of interest or risk factors for deficient healing or immune alterations (no obesity, diabetes, aneurysm; non-smoker; no malnutrition; no liver or kidney failure; etc.), who was referred to us after 8 inguinal hernia surgeries and 12 mesh implants in the abdominal wall. The patient had spent the last 6 years undergoing surgery after surgery, without being able to live a normal life. What started out as a small unilateral inguinal hernia turned into a recurring hernia, chronic seroma, fistula, pubic incisional hernia, infraumbilical incisional hernia and, finally, iliac incisional hernia, as well as an abdominal wall that was fibrous, wood-like, insensitive and deformed (Fig. 1). The patient was monitored until the closure of the skin infection. He was made to walk 1 h per day, and tomographic reconstruction of the abdominal wall was used (defect 10 cm×12 cm on the iliac spine, with intestinal content). After confirming the state of the entire abdominal wall, we operated

and found the remains of several surgical mesh implants and cavities. Another 2 whole mesh implants measuring 20 cm had been rejected and located on top of necrotic tissue (one premuscular on the entire midline and another retro-muscular on the upper inguinal area); these mesh patches were totally wrinkled and showed no signs of integration (Fig. 2). The implants were removed and the affected tissue

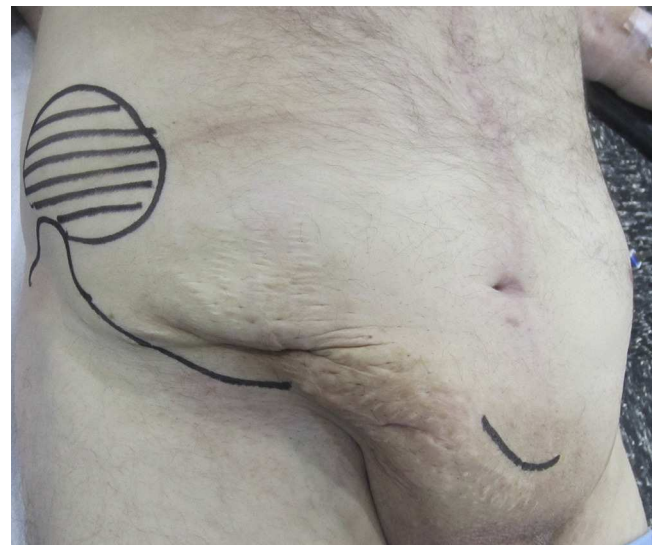


Fig. 1 – Physical examination of the patient; the iliac crest and defect have been outlined; the skin is deformed, thickened and presents trophic alterations.

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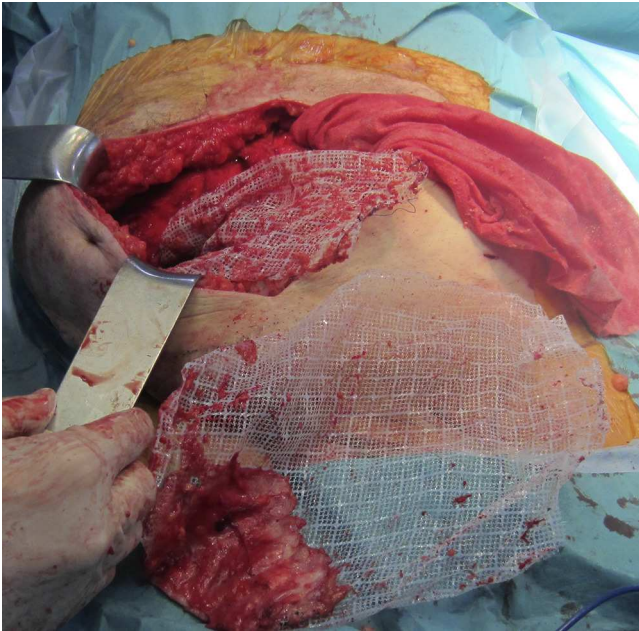


Fig. 2 – Detailed image of the abdominal wall showing how the right subcutaneous flap was created, the site of the premuscular rejection, and wrinkled mesh with no integration.

was cleaned. In spite of the situation, we decided to use a containment repair of the entire right hemiabdomen with a low-density, polypropylene, large-pore (3 mm), titanium-coated mesh (24 g/m²) (TiMesh[®], PdF, Germany). After 24 h, the retromuscular drain was withdrawn, followed by the superficial drain after 48 h. On the 3rd day, the patient was discharged with no complications. He currently remains asymptomatic and has had no complications or recurrence.

This case makes us reflect on our use of surgical mesh in abdominal wall surgery. Mesh implants do not avoid recurrences and can cover up an improper technique by an insufficiently trained surgeon. We must remember that the mesh is only a resource that should be implanted with correct technique; the mesh itself is not the technique. In order to avoid recurrences, we must not forget to properly identify the

complete inguinal space, perform careful anatomical dissection, and identify and treat all the weak areas, lipomas and hernia sacs of the myopectineal orifice.³⁻⁵ Fascial repair techniques have been forgotten, but the problem is that, along with them, the need for correct regional dissection has also fallen along the wayside. We cannot trust that a mesh implant, regardless of the type, will be able to resolve all our problems. In coming years, we may see an increase in the number of very complex cases in patients with multi-recurrent hernias and we will have to be prepared to provide a solution. Two lessons can be learned from this case: (1) the need for correct management of mesh techniques, indications and adequate understanding of the properties of the mesh that we are using; and (2) the need for continued training and learning in abdominal wall problems, in which case the possibility of surgical specialization seems prudent.

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