

PATIENT CASE EXAMPLE

AmnioFix[®] used in Anal Fistula Repair

Francis S. Lee MD, FACS, Quan Le, Christina W. Lee
Irvine, CA

CHALLENGE

The main goals of anal fistula repair are to eradicate chronically or acutely infected anal fistulae and promote complete healing of the lesion. Due to its simplicity and relatively good outcome the most common surgical technique employed is fistulotomy.¹ However, this type of repair leaves behind a rather large open wound, which can bleed, cause pain and even increase inflammation or infection. Alternately, fistulectomy has certain advantages over the fistulotomy due to a completely closed incision and eradication of the fistula. The approach is far from ideal, as fistulectomy can result in higher infection rates, more pain, and longer healing and surgical time.²

Since the healing process is the biggest challenge for any fistula repair, AmnioFix with its rich content of growth factors and bioactive proteins can potentially be used as an adjunct treatment in this setting, to modulate inflammation, enhance healing, and reduce scar tissue formation.

CLINICAL HISTORY

The patient is 39-year-old male with a 10-year history of anal fistula. He is a non-smoker and has had a very stressful job for the past 7 years. He reported pain during his bowel movements. He had occasional bloody diarrhea, associated painful eruption of perianal abscess and spontaneous drainage. He usually used gauze and tape to stop the bleeding and purulent drainage and would routinely take oral antibiotics and pain medications until the symptoms subsided. He did not seek surgical consultation until his most recent peri-rectal abscess became quite significant and the pain was too much for him to bear. He had developed a large anal fistula due to this long-standing problem.



Figure 1

Passing probe from external anal fistula opening site to internal opening site

SURGICAL INTERVENTION

The patient was informed of all potential treatment approaches and chose fistulectomy with AmnioFix injection and applying AmnioFix sheet allograft to the surrounding fistulectomy site.

Following an open incision, both external and internal opening sites of the fistula tract were identified (Figure 1). The fistula tract was carefully excised and extracted with a traditional fistulectomy technique. The granulation tissue in the fistula was then curetted (Figure 2). After the fistula was completely extracted, 160 mg of AmnioFix was injected to the fistula tract followed by insertion of a 2 cm x 6 cm AmnioFix sheet on the anal repair site and secured with absorbable sutures. (Figure 3 & 4). Finally, the external opening site was carefully closed.



Figure 1

Passing probe from external anal fistula opening site to internal opening site



Figure 2

Curette the granulation tissue



Figure 3

160 mg of AmnioFix injected into the fistula tract



Figure 4

Using absorbable suture to secure 2 cm x 6 cm AmnioFix in place

FOLLOW UP

The patient was followed weekly for two weeks and his healing rate was carefully monitored. He healed completely within four weeks of the surgery without any sign of drainage or other complications. The patient had minimal pain for which he required only mild form of analgesics. He was back to work within two weeks of surgery. He was released from the surgeon's care six weeks post op without any sequelae.

CONCLUSION

Anal Fistulectomy is a definitive surgical procedure to heal the anal fistula; however, the traditional technique has a higher complication rate including recurrence, infection, pain and inflammation than the often favored fistulotomy approach. Incorporating AmnioFix injectable and AmnioFix sheet grafts into the repair has shown a promising potential for more rapid healing with less complications and higher patient satisfaction.

REFERENCES

1. Filingeri, V., et al. "Radiofrequency fistulectomy vs. diathermic fistulotomy for submucosal fistulas: a randomized trial." *Europen review for medical and pharmacological sciences* 8 (2004): 111-116.
2. Nazeer, Mohammad Adnan, Rizwan Saleem, and Mansab ALI. "Better Option for the Patients of Low Fistula in Ano: Fistulectomy or Fistulotomy." *Pain* 57:38.