

Treatment of Pilonidal Sinus: How Best to Prevent a Recurrence

JC Baid

Broadly speaking, surgical treatment of pilonidal sinus is classified as under:

- (1) Complete excision of the sinus and dealing of the raw area or wound by various methods.
- (2) Simple incision or laying open of the sinus.

(A) Complete excision of the sinus is a preferred method of the treatment when the lesion is in a quiescent phase. If there is an actual abscess present; then it is to be drained first by a small incision and actual excision is undertaken after 2 to 3 weeks. As an immediate preliminary to operation some prefer to inject methylene blue dye into the sinus in order to stain all tracks to ensure complete excision.

Under G.A. in prone position with elevated sacrococcygeal region, an elliptical incision is made to include all sinus openings; if there is a secondary sinus which usually lies laterally; the incision is extended to incorporate it either as a special offshoot or as an enlargement of the whole ellipse. The incision is deepened at right angles to the skin through healthy fat to reach the fascia covering the coccyx and sacrum. The resulting wound is considerably large and may be dealt with in several ways, e.g.

- (1) Primary suture
- (2) Closure by plastic procedures
- (3) Leaving the wound open to granulate

Sr. Consultant Surgeon, St. Francis Hospital, Mittal Hospital, Ajmer. Ex. HOD Surgery, JLN Medical College, Ajmer.

- (4) Use of silicone foam sponge
- (5) Thiersch grafting of the open wound

Primary Suture:

The advantages of this procedure are obvious, i.e.

- (i) Entire period of hospitalization is reduced to 10-14 days.
- (ii) Patient is spared from frequent and painful dressing change.

This is perhaps the most ideal but sometimes it is very difficult to achieve the aim. Sepsis and wound breakdown may occur. To avoid this it is necessary to pass deep sutures through the whole thickness of the sidewalls of the wound on either side down to the bone using Nylon or braided Silk. Needless to say, perfect haemostasis is mandatory.

Once infection occurs, the entire wound is reopened and allowed to heal by granulation. Holm and Hutten claimed 90% success in their cases treated by primary suture,² whereas Gabriel reported success in 60% cases.¹ Recurrence rate in primary closure is about 4%.^{1,2}

To achieve good results following tips should be observed:

- Technique.
- Perfect haemostasis.
- 7 to 10 days hospitalization nursed partly on back to exercise a gentle compression of the wound or lying on one or other side.
- Best cases are women with their more elastic tissue rather than short thick set

males with tough elastic tissue.

Closure by Plastic Procedures:

Z-plasty^{3,4} or eccentric elliptical excision with subsequent under cutting of the medial margin and its advancement across the midline (Karydakin 1973 and Kitchen 1982).

The multiplicity of techniques, however, strongly suggests that these operations are neither simple to perform nor by any means invariably successful in their results. Once there is breakdown it takes longer time to heal than if no attempt had been made to suture the wound at all.

Leaving the wound open to granulate

By this method, after haemostasis has been achieved wound is simply packed with gauze soaked in antiseptic solution. It is simplest and best in all hands and more reliable than any form of primary closure and recurrence rate is much less than a successful primary closure. Only objection of this procedure is :

1. It takes about 8 to 10 weeks to heal so the patient is away from outdoor activity.
2. Inconvenience of daily painful dressing change.

Nortaras made a comparative study of patients treated by excision with suture and excision followed by granulation respectively and found that though the average period in hospital was longer with the latter method, there was not a much difference in average period of work off in the two methods.⁵

(B) Simple incision of the sinus

The operation is advised on the basis of the theory of acquired aetiology. It comprises of the complete laying open of the sinus or fistula and scraping of the wall of the cavity,

leaving only granulation tissue. The cavity which is superficial requires packing and daily dressing. Usually it takes about 6 to 8 weeks to heal completely. Nortaras noted 6 recurrences in 45 patients treated by this method.⁵ However, the procedure is only recommended if the sinus is superficial.

Prevention of Recurrence

To prevent recurrence, prevention of further drilling of the skin by hair is essential if we accept the hypothesis of acquired aetiology. The various methods available are:

1. Local post operative irradiation
2. Use of depilating creams
3. Electrolysis
4. Regular shaving of the area
5. Simple scrubbing

Frequent shaving of the part is recommended if possible as the patient cannot do it himself; he has to depend on some reliable person.

Simple scrubbing of the area daily vigorously by the towel is very effective and patient can do it himself. This is the only reason why we recommend this to all patients in the post operative period and later on.

References

1. Gabriel (1963) Principles and practice of rectal surgery, 5th edition, London: H. K.Lewis
2. Holm J, Hutten L. Simple primary closure for pilonidal sinus. *Acta Chir Scand* 1970 : 1136,537.
3. Middleton MD. Treatment of pilonidal sinus by Z-plasty. *British Journal Surgery* 1968; 55 : 516.
4. Monro RS, McDermott FT. The elimination of causal factors in pilonidal sinus treated by Z-plasty. *British Journal Surgery* 1965; 52 : 177.
5. Nortaras MJ. A review of three popular methods of treatment of postanal sinus disease. *British Journal Surgery* 1970; 57 : 886.