Results of Whitehead Operation

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Eighty-four patients underwent the Whitehead procedure for extensive hemorrhoids. Early postoperative complications, excluding urinary difficulties, developed in six patients. Long-term results were within an acceptable range. [Key words: Whitehead operation: technique, complications; Comparison of results]

THE PURPOSE of this paper is to present the incidence of postoperative complications and long-term results in a series of 84 consecutive patients upon whom a Whitehead hemorrhoidectomy was performed by the author from 1978 through 1982. Patients operated upon by the surgical residents and those with postoperative follow-ups of less than six months were excluded from this study.

Materials and Methods

All patients presented with either circumferential grade four hemorrhoids¹ (29 patients) or with circumferentially thrombosed hemorrhoids with the so-called doughnut deformity (55 patients). The reason for the Whitehead operation was because conventional closed hemorrhoidectomy would have been inadequate.

Some of the modifications of the original procedure were modified by elimination of dietary restrictions before and after operation. The sphincters were not rendered passive and interrupted, absorbable, polyglycolic sutures were used instead of silk. Neither cleansing enemas nor asperients were used preoperatively. All patients were operated upon in the jackknife position under caudal, spinal or general anesthesia; local anesthesia was not employed. Neither rubber drains nor anal packing were used. The external hemorrhoids were excised, care being taken to preserve a slight excess of perianal skin so the anastomosis was free of tension. The

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mucocutaneous sutures included the lower edge of the internal sphincter muscle, a step that is extremely important: it not only anchors the anastomosis but also places it approximately 1/4 to 1/3 inch from the anal verge, where the internal sphincter usually ends.

On the day of operation, all patients were ambulated, offered regular diet, and pain was controlled with moderate doses of meperidine. On the first postoperative day, the latter was discontinued in favor of codeine, and stool softeners and warm sitz baths were started. Postoperative hospital stay ranged from two to eight days; 50 per cent of the patients were discharged from the hospital on the third postoperative day and 75 per cent by the fourth postoperative day. The mean postoperative hospital stay for the series was 3.7 days.

All patients were followed at weekly intervals for six to eight weeks, then at monthly intervals for six months, at which time they were discharged. Postoperative followup ranged from six to 72 months; 25 (30 per cent) of the patients were followed for longer than 12 months. Anal dilatations were strictly prohibited.

Table 1 shows the age distribution. The youngest patient was a 21-year-old woman, while the oldest was an 82-year-old woman; the mean age was 44.4 years.

Results

Excluding urinary difficulties, early postoperative complications developed in six (7 per cent) of the patients (Table 2). One patient had excessive bleeding that required control under anesthesia on the day of operation. Two additional patients had excessive bleeding on the fifth and eighth postoperative days, respectively, which subsided spontaneously with bed rest and sedation. Two patients developed fecal impactions which required manual disimpaction under anesthesia. Finally, one patient developed a perianal wound abscess on the

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Age, Years	Pat	ients
	Number	Per Cent
21-30	15	17.9
31-40	27	32.0
41-50	19	22.6
51-60	10	12.0
61-70	10	12.0
71-80	2	2.4
81-90	1	1.1

TABLE 1. Age Distribution

eighth postoperative day which responded to incision and drainage under anesthesia.

Late postoperative complications occurred in 11 (13 per cent) patients (Table 3). Three patients developed anal tags and pruritus and two patients developed anal fissures that healed spontaneously with conservative means. Three patients complained of incontinence to flatus and occasionally to loose stools; one was a 36-year-old woman and the remaining two were 45- and 77-year-old men, respectively. Three patients developed anal strictures; in two patients they were severe enough to require surgical correction. No patient in this series developed ectropion.

Discussion

Andrews' excoriating publications,^{2,3} have haunted the Whitehead operation for almost 90 years. He polled several eminent surgeons on both sides of the Atlantic and compiled a list of bad results following Whitehead operations that included incontinence, sphincter paralysis, chronic inflammatory proctitis, tubular ulcer, irritable and painful anus, ectropion of the mucosa, neuralgia of the pelvis and lower extremities, general neurasthnia, fatal peritonitis, fatal and nonfatal septic complications, and fistula-in-ano. Most of his complaints are too bizarre to be taken seriously, but some of the complications, such as ectropion of the rectal mucosa and consequent wet and incontinent anus (the so-called "Whitehead deformity"4), as well as anal stricture, are valid criticisms and deserve serious inquiry. In fact, several authors⁵⁻¹⁰ have proposed modifications to eliminate these complications. The author, on the other hand, agrees with O'Connor8 that

TABLE 3. Late Complications

Complication	Number
Anal tags	3
Anal fissure	2
Incontinence	3
Anal stricture	3
TOTAL	11

TABLE 2. Early Complications

Complication	Number		
Bleeding			
Primary	1		
Secondary	2		
Fecal impaction	2		
Wound abscess	1		
TOTAL	6		

the Whitehead operation *per se*, performed meticulously in patients with extensive hemorrhoidal disease, works adequately. Details of technique such as the anastomosis done without tension, use of interrupted polyglycolic sutures, respect for the sphincter apparatus, removal of all redundant mucosa, excision of just sufficient perianal skin, and inclusion of the lower edge of the internal sphincter muscle in the anastomotic sutures (as explained earlier) so as to recreate the neoanorectum, are equally important details.

Anal stricture develops because of disruption of the anastomosis and subsequent healing of the defect by granulation. Our incidence of anal stricture of 3.5 per cent is comparable to the experience of others as depicted in Table 4. The incidence of anal stenosis following conventional closed hemorrhoidectomy performed by the author is 4.0 per cent.¹¹

Ectropion develops because of redundant mucosa, lack of anoderm, and injury to the sphincter mechanism, and did not occur in this series. It occurred only once in a collected series of 915 patients (Table 4).

Finally, partial incontinence results from alterations of normal sensation due to loss of sensitive anoderm. Barring injury to the musculature, the incontinence is limited to flatus, mucus, and occasionally to loose stools. Such limited incontinence developed in 3.5 per cent of our patients. The incidence of some degree of incontinence following closed hemorrhoidectomy performed by the author was 3.6 per cent. Accurate diagnosis of incontinence depends on diligent enquiry by the surgeon. Thus, in a careful study by Read and associates, the incidence of partial incontinence following routine hemorrhoidectomy approximated 10 per cent.¹⁸

TABLE 4. Comparison of Results

Author	Number of Cases	Stricture	Ectropion
Tuttle ¹²	200	2	_
Anderson ¹³	100	5	—
Takaki ¹⁴	176	3	
Bishop ¹⁵	127	1	-
Hadda ¹⁶	127	1	1
Stone ¹⁷	185	5	-

References

- 1. Goligher JC. Surgery of the anus, rectum and colon. 3rd ed. Springfield: Charles C Thomas, 1975:118.
- 2. Andrews E. Some of the evils caused by Whitehead's operation and by its modification, the American operation. Trans Ill Med Soc 1895:433-46.
- Andrews E. Disastrous results following Whitehead's operation for piles and the so-called American operation. Columbus Med J 1895;15:97-106.
- 4. Ferguson JA. Repair of "Whitehead deformity" of the anus. Surg Gynecol Obstet 1959;108:115-6.
- Allingham HW. A modified method of performing Whitehead's operation for excision of piles. Med Press Circ NS 1888;45: 657-62.
- Burchell MC, Thow GB, Manson RR. A "modified Whitehead" hemorrhoidectomy. Dis Colon Rectum 1976;19:225–32.
- Granet E. An anorectoplasty for extensive and complicated hemorrhoids. Surgery 1953;34:72–86.
- O'Connor J. The radical cure of haemorrhoids: modified Whitehead's operation. Lancet 1910;2:916-9.

- Rand AA. The sliding skin-flap graft operation for hemorrhoids: a modification of the Whitehead procedure. Dis Colon Rectum 1969;12:265-76.
- White JE, Syphax B, Funderburk WW. A modification of the Whitehead hemorrhoidectomy. Surg Gynecol Obstet 1972; 134:103-5.
- 11. Khubchandani M. Unpublished data.
- 12. Tuttle JP. The office treatment of rectal disease and its limitations. Am J Surg 1906;20:47-51.
- 13. Anderson HG. The after-results of the operative treatment of haemorhoids. Br Med J 1909;2:1276-9.
- 14. Takaki Y. The results of 176 cases of internal piles treated solely by Whitehead method. Lancet 1910;1:929-33.
- 15. Bishop ES. An address on haemorrhoids. Br Med J 1911;1:1033-5.
- Hadda S. Die excision der hamorrhoiden nach Whitehead. Arch Klin Chir 1913;c:1029-31.
- 17. Stone HB. Immediate and late results of the Whitehead operation for hemorrhoids. Ann Surg 1913;58:647-52.
- Read MG, Read NW, Haymes WG, Donnelly TC, Johnson AG. A prospective study of the effect of haemorrhoidectomy on sphincter function and faecal continence. Br J Surg 1982;69:396–8.

Announcement

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