

瘢痕松解术联合内括约肌切断术治疗痔术后肛门狭窄的临床疗效分析

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摘要 **目的** 研究瘢痕松解术联合内括约肌切断术治疗痔术后肛门狭窄的临床疗效。**方法** 回顾性分析 2014 年 1 月 ~ 2020 年 1 月新疆医科大学第一附属医院收治痔术后肛门狭窄的 53 例患者临床资料。按方式分为瘢痕松解术联合内括约肌部分切断术组 27 例,瘢痕松解术组 26 例。观察两组术中出血量、手术持续时间、治疗前后肛门肛管直径变化、术后 VAS 疼痛评分、住院天数、复发率、术后临床疗效等资料。术后随访 6 个月。**结果** 治疗组治愈率为 96.29%,对照组治愈率为 88.46%,两组比较差异有统计学意义;治疗组术后的肛门肛管直径、术后 1 天的 VAS 疼痛评分、手术费用等均大于对照组,差异有统计学意义($P < 0.05$);住院天数及术后 10 天的 VAS 疼痛评分治疗组小于对照组,差异有统计学意义($P < 0.05$);治疗组术前病程、术后 5 天的 VAS 疼痛评分、手术时间、肛门狭窄严重度、性别、年龄比较差异均无统计学意义($P > 0.05$)。**结论** 瘢痕松解术联合内括约肌部分切断术治疗痔术后肛门狭窄疗效满意,明显改善患者术后的疼痛感及明显扩大肛门直径,有效预防再次狭窄风险。

关键词 痔术后肛门狭窄 瘢痕松解术 瘢痕松解术联合内括约肌部分切断术 手术治疗 临床效果

中图分类号 R6 **文献标识码** A **DOI** 10.11969/j.issn.1673-548X.2021.04.011

Clinical Analysis of Scar Lysis Combined with Internal Sphincterotomy in the Treatment of Anorectal Stenosis after Hemorrhoidectomy.
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Abstract **Objective** To evaluate the clinical effect of scar lysis combined with internal sphincterotomy in the repair of anorectal stenosis after hemorrhoidectomy. **Methods** We analysed 53 patients with Anorectal stenosis after hemorrhoidectomy in the First Affiliated Hospital of Xinjiang Medical University between 2014 and 2020. All patients were successfully operated. According to the surgery, the patients were divided into scar lysis combined with internal sphincterotomy (27 cases) and scar lysis (26 cases). The intraoperative blood loss, operation time, the course of preoperative, degree of anorectal stenosis, gender, age, the diameter of anal canal before and after treatment, the postoperative VAS pain score, the length of hospital stay (day), the recurrence rate, and the clinical effective rate after operation were compared between two groups. The patients were followed up for 6 months. **Results** The effective rate of treatment was 96.29% in the treatment group and 88.46% in the control group ($P < 0.05$). The operation time, the diameter of anal canal after treatment, and the postoperative VAS pain score on the 1st day after surgery in the treatment group were all higher than those of the control group ($P < 0.05$). The length of hospital stay (day), the recurrence rate, and the postoperative VAS pain score on the 10th day after surgery in the treatment group were lower than those in the control group ($P < 0.05$). There were no significant differences in preoperative course, the diameter of anal canal before treatment, the postoperative VAS pain score on the 5th day after surgery, the degree of anorectal stenosis, operation time, total cost, the gender and the age between two groups ($P > 0.05$). **Conclusion** Scar lysis combined with internal sphincterotomy for the treatment of anorectal stenosis after hemorrhoidectomy has a better clinical effect, which can obviously reduce the pain after operation, dilate the diameter of anal canal and effectively prevent the risk of recurrence.

Key words Anorectal stenosis after hemorrhoidectomy; Scar lysis; Scar lysis combined with internal sphincterotomy; Surgical treatment; Clinical effect

肛门狭窄是肛肠外科较常见的疾病之一,由于不同病因导致肛管直径或肛门腔直径缩小,使肛门狭窄

引起肠内容物通过困难。痔术后肛门狭窄是肛门狭窄的最常见原因,术后发生率为 1.2% ~ 10.0%,占肛门狭窄的 90%^[1~4]。国外有研究报道 Milligan - Morgan 术后肛门狭窄的发生率约 2.9%,吻合器痔上黏膜环切术发生率约 0.8% ~ 2.5%^[5~7]。目前治疗痔术后肛门狭窄分非手术治疗和手术治疗,轻度狭窄

基金项目:国家自然科学基金资助项目(81460133)

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可保守治疗,临床上保守治疗欠佳或狭窄较严重时,手术解除狭窄是较理想的选择。治疗肛门狭窄常见术式有瘢痕松解术、内括约肌部分切断术、切开挂线术、皮瓣移植术等,选择的手术方式不同其治疗效果也参差不齐。本研究讨论瘢痕松解术联合内括约肌部分切断术治疗痔术后肛门狭窄的临床疗效,现报道如下。

资料与方法

1. 一般资料:新疆医科大学第一附属医院肛肠科2014年1月1日~2020年1月31日收住53例痔术后肛门狭窄患者,均行痔手术。按手术方式分为两组,治疗组27例,对照组26例。治疗组(瘢痕松解术联合内括约肌部分切断术)患者年龄为21~73岁,平均年龄为 44.9 ± 12.17 岁,男性14例,女性13例;病程为1~26个月,平均病程为 98.6 ± 17.42 天,既往手术史:吻合器痔上黏膜环切术(procedure for prolapsed and hemorrhoids, PPH)术和PPH联合其他术式后肛门狭窄17例;混合痔外剥内扎术和外剥内扎术联合其他术式术后肛门狭窄5例;内痔环扎联合痔切除术后后肛门狭窄3例;痔切除术后肛门狭窄2例。轻、中、重度狭窄比例为1:9:17;对照组(瘢痕松解术)患者年龄为26~71岁,平均年龄为 52.3 ± 11.78 岁,其中,男性14例,女性12例;病程为1~25个月,平均病程为 161.45 ± 34.82 天;既往手术史:PPH术或PPH术联合其他术式后肛门狭窄17例;混合痔外剥内扎术或联合其他术式后肛门狭窄6例;内痔环扎术联合痔切除术后肛门狭窄1例;痔切除术后肛门狭窄2例;轻、中、重度狭窄比例为0:10:16。两组年龄、性别、狭窄程度、狭窄病因(既往手术史)比较,差异均无统计学意义($P > 0.05$)。

2. 诊断标准:参照《中医肛肠科常见病诊疗指南》中对肛门狭窄的拟定,纳入病例均为痔术后肛门狭窄患者^[8]。纳入标准:①所有患者经相关检查诊断为痔术后肛门狭窄患者及肛门肛管形态正常,无明显畸形;②年龄18~75岁肛门狭窄住院行手术治疗患者,性别不限;③经规范内科保守治疗后,疗效不明显或症状无明显改善者。排除标准:①排除有心脏、肺、肝脏、肾脏等严重功能不全者及血友病患者;②因肛门直肠恶性疾病手术后肛门狭窄患者;③结直肠溃疡性疾病及其他肛门疾病导致肛门狭窄。

3. 麻醉方式:采用骶管阻滞麻醉或硬膜外阻滞麻醉。有腰椎外伤骨折或高龄患者腰椎间隙融合和凝

血机制明显异常者,给予局部麻醉或静脉复合麻醉。

4. 手术方法:患者取侧卧位(左/右),周围铺无菌洞巾:①直肠指检确定切口,肛门肛缘7点位或者9点位做一纵行切口,长度为2~4cm,深度以切至瘢痕下组织为宜,部分切开瘢痕环及环周增生组织;②肛缘分别3、11点距肛门1.0~1.5cm处,做放射状切口约1cm至皮下,分离暴露肛门内括约肌,示指伸入肛门肛管内,右手用中号弯止血钳延肛门内括约肌插入挑起部分内括约肌,断离,挑起的肌束宁少勿多;③用左右两示指做反方向牵拉扩张,力度适中,节律性扩张肛门,扩肛至指诊可容纳两指顺利进入;④检查无明显出血,予以生物艾薇亭止血海绵压迫伤口,凡士林油纱条填充肛门,无菌纱布加压包扎,宽胶带固定(治疗组上述步骤均完成,对照组未给予步骤②)。术后患者均予以流质饮食,控便24h,给予抗炎、补液、止血、扩肛、乳果糖口服液软化大便等对症处理。

5. 疼痛评分标准:采用视觉模拟评分(visual analogue scale, VAS)进行评估。0分表示无疼痛;1~3分为轻微疼痛,可忍受;4~6分为中度疼痛,并影响睡眠,尚能忍受;7~10分为重度疼痛,不能忍受。

6. 疗效标准^[9]:治愈:临床症状及体征改善显著,患者肛门无疼痛,排便通畅,指诊通过顺利肛门直肠腔。有效:临床症状及体征改善明显,患者排便轻度顺畅,稍有疼痛感,指诊比较顺利。无效:未达到上述相关标准,且有加重趋势。手术有效率(%)=(治愈+有效)病例数/总病例数 $\times 100\%$ 。

7. 随访:术后第14天及30天,之后每隔30天门诊随访1次,随访期半年。随访情况:是否排便顺畅,有无肛门水肿,有无大便失禁及粪瘘等严重并发症发生。

8. 统计学方法:采用SPSS 24.0统计学软件对数据进行统计分析,正态分布的计量资料以均数 $\pm$ 标准差($\bar{x} \pm s$)表示,组间比较采用 t 检验,计数资料用率(%)表示,比较采用 χ^2 检验,以 $P < 0.05$ 为差异有统计学意义。

结 果

观察两组术后临床疗效,治疗组与对照组比较,差异有统计学意义($\chi^2 = 2.508, P = 0.016$),术后半年回访对照组有2例复发,复发率为7.69%,治疗组中无患者复发。治疗组的复发率明显低于对照组,差异有统计学意义($\chi^2 = 5.369, P = 0.000$,表1)。

表 1 两组临床疗效情况[*n*(%)]

组别	<i>n</i>	治愈	好转	未愈	有效	复发
治疗组	27	20(74.07)	6(22.22)	1(3.70)	26(96.29)	0(0)
对照组	26	18(69.23)	5(19.23)	5(11.53)	23(88.46)	2(7.69)

两组患者术前肛管直径比较差异无统计学意义 ($F = 0.490, P = 0.127$), 两组手术治疗后, 肛管直径均有不同程度的扩大, 治疗组扩大幅度明显高于对照组, 差异有统计学意义 ($F = 39.780, P = 0.000$, 表 2)。

表 2 肛管肛门直径术前、术后变化 (mm, $\bar{x} \pm s$)

组别	<i>n</i>	术前	术后
治疗组	27	8.67 ± 1.87	26.41 ± 0.89
对照组	26	8.74 ± 1.01	22.12 ± 2.91

采用 VAS 分别在术后第 1、5、10 天进行疼痛评估, 并记录 VAS 分数。术后第 1 天, 治疗组 VAS 大于

对照组, 差异有统计学意义 ($t = 23.05, P = 0.027$)。术后第 5 天, 两组 VAS 相近, 差异无统计学意义 ($t = 16.61, P = 0.056$)。但在术后第 10 天, 治疗组 VAS 明显小于对照组, 差异有统计学意义 ($t = 18.38, P = 0.000$, 表 3)。

表 3 术后第 1、5、10 天疼痛评分比较 (分, $\bar{x} \pm s$)

组别	<i>n</i>	术后第 1 天	术后第 5 天	术后第 10 天
治疗组	27	4.41 ± 0.51	2.27 ± 0.48	1.04 ± 0.11
对照组	26	4.07 ± 0.41	2.37 ± 0.44	1.83 ± 0.48

两组术中出血量比较, 差异有统计学意义 ($t = 4.521, P = 0.001$), 治疗组手术费用高于对照组, 差异有统计学意义 ($t = 14.700, P = 0.041$), 对照组术后住院天数较长, 差异有统计学意义 ($t = 4.109, P = 0.040$); 手术时间和总医疗费用相近, 差异无统计学意义 (t 值分别为 2.610、7.750, P 值分别为 0.114、0.213, 表 4)。

表 4 术中失血量、手术持续时间、住院天数、费用比较 ($\bar{x} \pm s$)

组别	<i>n</i>	术中出血量 (ml)	手术时间 (min)	住院天数 (天)	手术费用 (元)	总医疗费用 (元)
治疗组	27	6.30 ± 2.45	41.50 ± 11.48	4.00 ± 0.91	975.00 ± 50.13	5794.03 ± 728.89
对照组	26	4.30 ± 1.98	39.50 ± 8.75	4.50 ± 1.63	797.10 ± 161.79	5651.23 ± 401.17

讨 论

痔术后肛门狭窄常见于中青年, 患者经常出现大便排出困难及便条变细、大便不尽感或肛门坠胀不适、肛门疼痛^[10]、偶有便感频繁或排便次数增多, 严重狭窄者常依靠泻剂、灌肠、栓剂甚至指抠等方法辅助排便^[11]。临床诊断肛门狭窄并不难, 只需肛肠专科医生指诊或肛门镜检查, 结合患者临床症状及病史就可以诊断为肛门狭窄。肛门狭窄治疗包括非手术治疗和手术治疗, 医生根据狭窄严重程度、狭窄类型、具体位置、涉及狭窄范围、术者操作水平和经验选择合适的手术方案。轻、中度肛门狭窄保守治疗为主, 具体治疗包括膳食, 促进胃肠道蠕动, 润滑肠道通便药物, 扩肛治疗, 坐浴熏洗等物理疗法等以保持排便通畅^[12]。中、重度肛门狭窄在保守治疗无效或保守治疗效果欠佳时, 需外科手术治疗解除患者症状。外科手术是目前较理想治疗方案, 手术不仅解除患者排便不畅通症状, 还能切除术瘢痕组织促进患者康复时间。

肛门内括约肌部分切断术是目前比较可靠的传统术式, 由于解除内括约肌挛缩, 粪便通过肛管

顺畅, 肛门直径扩大, 达到临床治疗术器, 疗效持久, 复发率极低, 术后恢复速度较快, 但整体疗效不显著, 术后多次进行扩肛^[13]。瘢痕松解术也属于传统术式, 可以解除内括约肌的痉挛, 降低肛管静息压, 术后无需多次扩肛治疗, 但采用单一瘢痕松解术, 后期会出现切口愈合时间长, 复发肛门狭窄风险, 预后效果不甚理想^[14]。有报道显示, 瘢痕松解术有创伤性, 术后疼痛剧烈, 恢复较慢^[15]。上述两种术式联合应用肛门狭窄治疗, 相互弥补其不足, 不仅能有效切除术瘢痕, 切开肛门周皮肤和部分内括约肌, 对其他组织损伤较小, 达到扩大肛门直径目的, 还能够做到有效防止复发。研究结果显示, 瘢痕松解术联合内括约肌部分切除术手术操作简易, 不需要特殊手术器械, 减少术后并发症及复发。

综上所述, 采用瘢痕松解术联合内括约肌部分切断术治疗痔术后肛门狭窄达到手术治疗效果, 有效地改善肛门肛管的直径及减轻疼痛, 因样本量少, 有待于今后开展进一步研究。

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(收稿日期: 2021 – 01 – 18)

(修回日期: 2021 – 01 – 20)

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(收稿日期: 2020 – 11 – 12)

(修回日期: 2020 – 11 – 26)