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超声内镜在上消化道黏膜下肿瘤诊断和鉴别诊断中的价值*

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摘要 目的:分析超声内镜(EUS)在上消化道黏膜下肿瘤(SMT)诊断价值。**方法:**选取我院收治的 SMT 患者 81 例,均进行 EUS 检查,且在院内进行内镜,或者手术治疗,将 EUS 诊断结果与术后的病理结果进行对比分析。**结果:**本组 87 处病变,经 EUS 诊断结果显示,平滑肌瘤 35 处,间质瘤 36 处,异位胰腺 6 处,脂肪瘤 6 处,类癌 1 处,囊肿 1 处,2 处未做明确的诊断。经计算,EUS 诊断 SMT 的阳性预测值 79.31%,其中平滑肌瘤阳性预测值 94.29%,间质瘤阳性预测值 69.44%,异位胰腺阳性预测值 83.33%,脂肪瘤阳性预测值 66.67%。与术后病理诊断结果不符的 EUS 诊断病变共 18 处,诊断错误率 20.69%,食管病变 7 处,胃病变 10 处,十二指肠病变 1 处。**结论:**EUS 对上消化道 SMT 的诊断效果总体令人满意,但需要注意鉴别诊断,提高诊断准确率。

关键词:超声内镜;上消化道黏膜下肿瘤;诊断;价值

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Value of Endoscopic Ultrasonography in the Diagnosis and Differential Diagnosis of Submucosal Tumors in Upper Gastrointestinal Tract*

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ABSTRACT Objective: To analyze the diagnostic value of endoscopic ultrasonography (EUS) for submucosal tumors in upper gastrointestinal tract (SMT). **Methods:** 81 SMT patients in our hospital were selected and examined by EUS. All patients received endoscopy or surgery in the hospital. The EUS diagnosis results and postoperative pathological results were compared and analyzed. **Results:** EUS diagnosis showed that among all 87 lesions, there were 35 leiomyoma, 36 stromal tumors, 6 heterotopic pancreas, 6 lipoma, 1 carcinoid, 1 cysts, 2 without definite diagnosis. Through calculation, the positive predictive value of EUS in diagnosing SMT was 79.31%, and the value for leiomyoma was 94.29% stromal tumor 69.44%, ectopic pancreas 83.33%, and lipoma 66.67%. Altogether 18 lesions did not accord with postoperative pathological results, and the diagnostic error rate was 20.69%. Among the 18 lesions, there were 7 esophageal lesions, 10 gastropathy, 1 duodenal disease at the junction. **Conclusion:** The diagnostic effect of EUS on upper gastrointestinal tract SMT is satisfactory, but we still need to pay attention to differential diagnosis and improve the accuracy of diagnosis.

Key words: Endoscopic ultrasonography; Upper gastrointestinal submucosal tumor; Diagnosis; Value

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前言

上消化道黏膜下肿瘤是比较常见的肿瘤,可能在内镜检查中被检出,但普通内镜难以分辨表面覆盖正常黏膜的肿瘤,因此诊断仍然存在困难,传统的影像学方法如 CT、MRI 等均具有各自的缺陷,一般难以收到令人满意的诊断结果^[1-3]。目前影像学方法在不断进步,EUS 则是一种新兴的消化道检查技术,也是目前诊断 SMT 的主要检查方法^[4],将内镜置入人体腔,通过内镜直接观察消化道病变,并且通过超声实时扫描,获得胃肠道层次结构和周围脏器图像^[5],对 SMT 的诊断中,其结合了超声和内镜的特点,其可通过内镜观察肿瘤一般形态^[6],时常发现隆

起病灶,表面粘膜光滑,可能伴有溃疡^[7]。并且可通过高低回声判断肿瘤性质,排除腔外脏器压迫,并且根据各腔壁结构,判断是否存在淋巴结增大以及进行肿瘤的定性诊断,如平滑肌瘤、间质瘤以及脂肪瘤等^[8-10]。本研究对 EUS 在上消化道黏膜下肿瘤(SMT)诊断价值进行探讨,现报道如下。

1 资料与方法

1.1 一般资料

我院自 2014 年 7 月 -2016 年 11 月收治的 SMT 患者 81 例,均进行 EUS 检查,其中男 40 例,女 41 例,年龄在 18-76 岁,平均年龄(45.6±9.3)岁;其中 18-49 岁患者 36 例(44.44%),

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50-59 岁患者 28 例(34.57%),60-76 岁患者 17 例(20.99%)。临床症状:腹胀、腹痛、吞咽困难、吞咽不适、反酸、呕吐、恶心、纳差等。其中病变 87 处,食管病变 43 处,胃病变 42 处,十二指肠病变 2 处。食管病灶部位长径为 0.3-6.0 cm,胃病灶部位长径为 0.6-6.2 cm,十二指肠病灶部位长径为 1.0-2.8 cm。

1.2 方法

给予患者口含的利多卡因胶浆进行局部麻醉,待麻醉起效,行超声内镜检查,患者选择左侧卧位,超声探查选择浸泡法,超声内镜下观察病变的形状、大小、回声特点、部位、及起源层次,记录诊断结果。

1.3 观察指标

观察病理诊断结果与 EUS 诊断结果的准确率分布进行统计,其中包括平滑肌瘤、间质瘤、异位胰腺、脂肪瘤、类癌、囊肿、神经鞘瘤、布氏腺瘤、血管瘤、鳞腺癌、颗粒细胞瘤、增生性息肉、梭形细胞瘤、纤维样息肉、淀粉样变、炎性改变、未诊断出。同时对病理诊断结果与 EUS 诊断结果的不符合情况进行统计,其中包括回声情况(低回声、中低回声、中回声、中高回声、

无回声、均匀回声、不均匀回声),起源层次(第 2 层、第 3 层、第 4 层),EUS 诊断(平滑肌瘤、间质瘤、异位胰腺、脂肪瘤)。

1.4 统计学方法

数据采用专业 SPSS 17.0 软件进行统计学分析处理。计数资料用率(%)表示,计量资料以 $\bar{x} \pm s$ 表示,组间 t 检验,计数资料采用 χ^2 检验, $P < 0.05$ 差异有统计学意义。

2 结果

2.1 病理诊断结果与 EUS 诊断结果的准确率分布

本组 87 处病变,经 EUS 诊断结果显示,平滑肌瘤 35 处,间质瘤 36 处,异位胰腺 6 处,脂肪瘤 6 处,类癌 1 处,囊肿 1 处,2 处未做明确的诊断。因为类癌及囊肿样本数过小,因此不进行诊断准确率统计。经计算,EUS 诊断 SMT 的阳性预测值 79.31%,其中平滑肌瘤阳性预测值 94.29%,间质瘤阳性预测值 69.44%,异位胰腺阳性预测值 83.33%,脂肪瘤阳性预测值 66.67%。见表 1。

表 1 病理诊断结果与 EUS 诊断结果的准确率分布 [处,%]

Table1 Distribution of accuracy between pathological results and EUS diagnosis results [n, %]

Types	EUS diagnosis	EUS accordant with pathology	Positive predicative rate
Leiomyoma	35	33	94.29(33/35)
Stromal tumor	36	25	69.44(25/36)
Ectopic pancreas	6	5	83.33(5/6)
Lipomyoma	6	4	66.67(4/6)
Carcinoid	1	1	-
Cyst	1	1	--
Schwannoma	0	0	-
Brinell adenoma	0	0	-
Angioma	0	0	-
Squamo-adenocarcinoma	0	0	-
Granulosa cell tumor	0	0	-
Hyperplastic poly	0	0	-
Spindle cell tumor	0	0	-
Fiber sample polyps	0	0	-
Amyloidosis	0	0	-
Inflammatory change	0	0	-
No definite diagnosis	2	0	-
Total	87	69	79.31(69/87)

2.2 病理诊断结果与 EUS 诊断结果的不符合情况分布

与术后病理诊断结果不符的 EUS 诊断病变共 18 处,诊断错误率 20.69%,食管病变 7 处,胃病变 10 处,十二指肠病变 1 处。详见表 2。

3 讨论

消化道黏膜下肿瘤决大多数为间叶细胞来源的肿瘤,包括间质瘤、平滑肌瘤、脂肪瘤等等。内镜超声是鉴别诊断的重要方法^[11,12]。上消化道 SMT 时常无典型的临床症状,通过普通胃镜难以发现,因此其鉴别和诊断方法显得十分重要^[13],本研究采用超声内镜诊断平滑肌瘤阳性预测值达到 94.29%。平滑肌瘤是常见上消化道 SMT,大部分于试管中发生,也可发

表 2 病理诊断结果与 EUS 诊断结果的不符合情况分布 [处, %]

Table 2 Distribution of lesions' pathological results not accordant with EUS diagnosis results [n, %]

Items		Esophagus (n=7)	Stomach (n=10)	Duodenum (n=1)	Total (n=18)
Echo	Low	5(71.43)	6(60.00)	0(0.00)	11(61.11)
	Lower middle	1(14.29)	3(30.00)	1(100.00)	5(27.78)
	Middle	1(14.29)	1(10.00)	0(0.00)	2(11.11)
	Higher middle	1(14.29)	0(0.00)	0(0.00)	1(5.56)
	None	1(14.29)	0(0.00)	0(0.00)	1(5.56)
	Even	6(85.71)	4(40.00)	0(0.00)	10(55.56)
	Uneven	1(14.29)	7(70.00)	1(100.00)	9(50.00)
Origin layer	Second layer	3(42.86)	1(10.00)	0(0.00)	4(22.22)
	Third layer	1(14.29)	3(30.00)	1(100.00)	5(27.78)
	Fourth layer	3(42.86)	6(60.00)	0(0.00)	9(50.00)
EUS diagnosis	Leiomyoma	2(28.57)	0(0.00)	0(0.00)	2(11.11)
	Stromal tumor	4(57.14)	6(60.00)	0(0.00)	10(55.56)
	Ectopic pancreas	0(0.00)	2(20.00)	0(0.00)	2(11.11)
	Lipomyoma	1(14.29)	2(20.00)	1(100.00)	4(22.22)

生于结直肠,在超声内镜下多表现为低回声团块、边界清晰^[14-16]。小肿瘤表现为无回声或者低回声,大肿瘤部分表现为内部高回声,而采用超声内镜可获得较为准确的病情判断,与病理不符合仅 2 例^[17]。

异位胰腺属于先天畸形的一种^[18,19],和正常胰腺并没有血管、解剖联系,常见于十二指肠、空肠、胃等区域,在内镜下表现为光滑粘膜下隆起,EUS 下则可表现为不均匀高回声团块,也比较容易诊断^[20]。本研究对异位胰腺的诊断准确率属于较高水平,阳性预测值达 83.33%。

脂肪瘤也是常见良性肿瘤绝大部分脂肪瘤在粘膜下层发现^[21,22],表现为黄色外观,边界清晰且光滑,超声内镜对脂肪瘤的诊断阳性预测值并不理想,同时对间质瘤的诊断亦是如此,大部分不符合的病例均是 3、4 层低回声病变,不符合病理诊断的结果,中低回声占多数。特别是诊断为间质瘤,不符合率最高,临床工作中应注意鉴别^[23-25]。

综上所述,EUS 对上消化道 SMT 的诊断效果总体令人满意,可单独用于 SMT 诊断,但需要注意鉴别诊断,提高诊断准确率。

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