

Gastric linitis plastica

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Creation Date: September 2002

Scientific Editor: Professor. Jean-Alain Chayvialle

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Abstract

Gastric linitis plastica is a very particular malignant gastric tumor different from the usual gastric adenocarcinoma. Linitis plastica refers to the diffuse proliferation of the connective tissue, resulting in tissue thickening so that the stomach is constricted and rigid. Pathological exams reported a strong connective stroma-reaction associated with a malignant glandular proliferation of independent cells (signet-ring cells), invading all the layers of the digestive tract, the mucosa being usually save not affected. Diagnosis is based on the association of pathological results findings revealed by endoscopic, endoscopic ultrasonography, radiological and surgical examinations. Opposed to the adenocarcinoma, Helicobacter Pylori seems not to be associated with the occurrence of gastric linitis. Familial forms of gastric linitis and breast cancer-associated forms have been reported. Treatment of gastric linitis without carcinomatosis is based on surgical resection, mainly a total gastrectomy. However, prognosis is poor, leading some surgeons to question the interest of such resection. A chemotherapy is usually offered to the patient, but no guideline has been really established, and results are also variable.

Keywords

Malignant gastric tumor, connective stroma-reaction, malignant glandular proliferating cells.

Definition

Linitis plastica refers to the diffuse proliferation of the connective tissue, resulting in tissue thickening so that the stomach is constricted and rigid. Pathological exams reported a strong connective stroma-reaction associated with a malignant glandular proliferation of independent cells (signet-ring cells), invading all the layers of the digestive tract, the mucosa being usually save not affected.

Diagnosis

Diagnosis is based on the association of pathological results findings revealed by endoscopic, endoscopic ultrasonography, radiological and surgical examinations. Endoscopic ultrasonography became the

reference examination enabling the detection of localized lesion, thus changing the classical aspect of complete gastric involvement of gastric linitis.

Etiology

Opposed to the adenocarcinoma, *Helicobacter Pylori* seems not to be associated with the occurrence of gastric linitis. Familial forms of gastric linitis and breast cancer-associated forms have been reported.

Epidemiology

The age of onset is below 40 years old. Cases diagnosed with isolated signet ring cells do not always correspond to gastric linitis and can be classical stomach adenocarcinoma. This fact is

not well known, and leads to erroneous diagnosis, making difficult the analysis of medical literature.

Particularity of evolution

Distant tumor involvement in lymph nodes or peritoneum (peritoneal carcinomatosis) is frequent and alters the prognosis. Another type of evolution includes the association of gastric linitis with colic or rectal linitis tumors, with a similar infiltrating aspect.

Treatment

Treatment of gastric linitis without carcinomatosis is based on surgical resection, mainly a total gastrectomy. However, prognosis is poor, leading some surgeons to question the interest of such resection. A chemotherapy is usually offered to the patient, but no guideline has been really established, and results are also variable.

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