SYNCHRONOUS GASTRIC AND RECTAL CANCER IN A 50 YEAR-OLD MAN – CASE REPORT

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The occurrence of synchronous tumors of the gastrointestinal tract is rarely observed in general surgery, diagnosis is frequently incidental, often intraoperatively. The aim of this study was to present a case of a 50 year-old male patient admitted to the Department of Gastroenterology, University Hospital in Białystok, due to abdominal pain, significant weakness and excretion of tarry stools. Imaging diagnostics revealed the presence of a large gastric tumor (histopathological type – adenocarcinoma), and single metastasis to the liver. The patient was qualified for total gastrectomy. Surgery was performed at the 1st Department of General and Endocrinological Surgery, University Hospital in Białystok. Rectal cancer, which was observed during the operation was removed simultaneously.

Key words: synchronous tumor, gastric cancer, colorectal cancer

Synchronous tumors are independent primary tumors which occur simultaneously. The above-mentioned gastrointestinal lesions are rarely observed, posing diagnostic difficulties. Their diagnosis is usually incidental, despite progress in imaging techniques. Usually, intraoperatively it is possible to detect a second neoplastic lesion of the gastrointestinal tract. The study presented a case of a male patient qualified for gastrectomy, due to cancer. During surgery we observed the presence of macroscopic features of colorectal cancer.

CASE REPORT

A 50-year old male patient was admitted to the 1st Department of General and Endocrinological Surgery, Medical University in Białystok for the surgical treatment of gastric cancer. The patient was transferred from the Department of Gastroenterology, where he was diagnosed because of abdominal pain, general weakness, loss of body weight (8 kg in one month), reduced physical tolerance and excretion of tarry stools. The family history considering neoplastic disease proved positive: a third-degree relative was diagnosed with gastric cancer and underwent surgery. The patient smoked twenty cigarettes daily for a period of twenty years, the last ten years he was a non-smoker. Laboratory results showed signs of significant anemia, while the per rectum examination – presence of tarry stool. There were no other pathologies.

During hospitalization at the Department of Gastroenterology the patient was subject to gastroscopy with histopathological sampling, computed tomography (fig. 1), and abdominal ultrasound. Diagnostics showed the presence of gastric cancer (adenocarcinoma) and an isolated metastatic lesion in the liver. After proper preparation the patient underwent elective surgery, consisting of total gastrectomy with resection of the greater omentum (fig. 2), D2 lymphadenectomy, splenectomy and resection of the isolated, metastatic lesion in the right lobe of the liver. Intraoperatively,
during control of the abdominal cavity we observed the presence of rectal cancer, macroscopically malignant, located 10 cm from the anal sphincter (fig. 3). The scope of the operation was extended-the patient was subject to anterior resection of the rectum with end-to-end anastomosis by means of a stapler (29 mm in diameter). The postoperative course proved uneventful.

The histopathological postoperative examination of the stomach confirmed the previous diagnosis of cancer- adenocarcinoma G2pT3, intestinal type according to Lauren, type I according to Goseki. Additionally, 4 of the 14 minor curvature lymph nodes and 2 of the 12 major curvature lymph nodes showed features of metastasis. The histopathological result of the rectal tumor was as follows: adenocarcinoma G2pT3. The patient was qualified for adjuvant chemotherapy.

**DISCUSSION**

Synchronous gastrointestinal tract tumors are mainly observed in patients over the age of 60 years (1). Old age is one of many factors increasing the risk of cancer incidence, apart from the less significant, such as genetic predisposition, dietary habits, and stimulants (coffee, alcohol, tobacco). According to Polish literature data the simultaneous occurrence of two independent, primary gastrointestinal tumors ranges between 5% and 14%, increasing more than twice in case of patients with a positive family history (2). According to literature data the coexistence of synchronous cancer with gastric carcinoma ranges between 1% and 4% (3), with colorectal (37%) and lung cancer (17%) most common (4). Both in case of gastric and colorectal cancer diagnosis, one may determine the presence of metastatic lesions to the liver. The occurrence of „meta” type lesions is strictly correlated with the progression of the basic neoplastic disease. The simultaneous resection of both the metastatic lesion and primary gastrointestinal tumors significantly improves prognosis (1, 5). It is estimated that the five-year survival rate in case of the above-mentioned patients exceeds 40% (6). The problem of thorough preoperative diagnostics considering patients diagnosed with gastrointestinal tumors is worth mentioning.

Considering the presented study case the examinations which were performed enabled to diagnose, both gastric cancer and the hepatic metastasis. However, only during total gastrectomy did we observe the presence of a
synchronous neoplastic lesion located in the rectum. This situation prompted surgeons to change the operative tactics. The risky decision concerning the simultaneous resection of all gastrointestinal tract tumors was undertaken. There is no doubt that simultaneous surgery, both time-consuming and extensive, and burdened with the high preoperative risk, as well as two-staged surgery are difficult procedures, which should depend on the patients general condition, and stage of the neoplastic disease. Based on literature data the risk of complications and the mortality rate after one-staged and two-staged surgical procedures are similar (7). The decision concerning simultaneous surgery is also difficult, because of the lack of histopathological diagnosis of the synchronous lesion. It is worth noting that on one hand, there is lack of clear guidelines concerning treatment of synchronous tumors, and on the other hand, the good of the patient should lead us towards detailed preoperative diagnostics, in order to diagnose all lesions.

During the examination of 205 patients, aged between 32 and 81 years, qualified for surgical treatment of gastric adenocarcinoma, with a negative family cancer history, and no symptoms form the lower GI tract, Kim et al. observed the presence of synchronous colorectal cancer in 2.9% of patients. The above-mentioned concerned patients > the age of 50 years (8). Considering Polish and worldwide literature data there are only several publications concerning the problem, which makes the issue even more interesting.

CONCLUSIONS

The presence of cancer in the upper or lower gastrointestinal tract requires full diagnostics, including endoscopy, ultrasonography, and abdominal computed tomography, which does not guarantee in 100% the detection of synchronous lesions.

The occurrence of synchronous gastrointestinal tract tumors in most cases concerns patients over the age of 50 years.

Prognosis in case of synchronous lesions is generally poor, due to the advanced stage of the neoplastic disease at diagnosis.

In case of intraoperative detection of a synchronous tumor one should always consider its excision, since in most cases, the postoperative histopathological examination result reveals the presence of a malignant lesion.

REFERENCES


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