Minimally-invasive methods of acute pancreatic post necrotic pseudocyst treatment

Nazar Omelchuk

Ivano-Frankivsk National Medical University, Ukraine

Statement of the Problem:

Acute necrotic pancreatitis (ANP) remains complicated problem of urgent surgery because of high frequency of systemic, purulent and septic complications, mortality rate, which is in patients with infected pancreonecrosis 14.7-26.4%.

Purpose:

The purpose of this study is to evaluate efficiency and establish indications for minimally invasive methods of treatment of post-necrotic pseudocyst of pancreas.

Methodology & Theoretical Orientation:

For diagnostics ultrasonography was used, diagnostic laparoscopy, helical CT with contrast strengthening. Endoscopic interventions were applied by duodenoscopes "Olympus" under control of X-ray machine "Siemens BV 300". Cystodigestive fistulas were created by prickly papilotoms. For providing of long passability of cystodigestive fistula were used two endoprostheses like "pig tail" sized 10 Ft with length 5-6 cm. For transpapillary drainage were used pancreatic endoprostheses like "pig tail", sized 5-7 Ft with length 5 cm

Findings:

In 82 (68.2%) patients were applied minimally invasive methods of treatment; Percutaneous external drainage in 38 (46.3 %) patients, endoscopic transmural drainage of postnecrotic pseudocyst in 22 (26.85%) patients. Combined endoscopic interventions were applied in 22 (26.85%) patients. In particular, endoscopic transmural drainage with temporary stenting of pancreatic duct in 11 (50%) patients, endobiliary stenting with temporary stenting of pancreatic duct in 5 (22.7%) patients, temporary stenting of pancreatic duct in 4 (18.2%) patients, endoscopic transmural drainage with percutaneous external drainage in 2 (9.1%) patient

Conclusion & Significance:

Usage of combined minimally invasive methods of treatment of acute necrotic pancreatitis complicated by post-necrotic pseudocyst help to improve results of treatment, reduction of complications amount, contraction of stationary treatment terms and improving of life quality.

Recent Publications:

1. Madacsy L, Kurucsai G and Joo I (2009) Rescue ERCP and insertion of small-calibre pancreatic stent to prevent the evolution of severe post-ERCP pancreatitis: a case-controlled series. Surg. Endosc. 23(8):1887-93.

2. Harewood G, Pochron N and Gostout C (2005) Prospective, randomized, controlled trial of prophylactic pancreatic stent placement for endoscopic snare excision of the duodenal ampulla. Gastrointest. Endosc. 62(3):367-70.

3. Bakker O, van Santvoort H and van Brunsshot S (2012) Endoscopic transgastric vs surgical necrosectomy for infected necrotizing pancreatitis: randomized trial. J.A.M.A., 307(10):1053-61.

4. Banks P, Bollen T and Dervenis C (2012) Classification of acute pancreatitis 2012-revision of the Atlanta classification and definitions by international consensus. Gut. 62(1):102-11.

5. Lau S, Simchuk E and Kozarek R (2001) A pancreatic ductal leak should be sought to direct treatment in patients with acute pancreatitis. American Journal of Surgery, 181(5):411-5

Biography:

Nazar Omelchuk works as an Abdominal Surgeon at Ivano-Frankivsk Regional Hospital and at Ivano-Frankivsk National Medical University. He is pursuing his PhD about minimallyinvasive methods of acute pancreatic post-necrotic pseudocyst treatment. He has three registered patents about new ways of acute pancreatic post-necrotic pseudocyst treatment.