

**CLINICAL ASSESSMENT OF THE MANAGEMENT OF ACUTE
MESENTERIC CIRCULATORY DISORDERS****Khakimov D.Sh**

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Abstract: Acute impairment of mesenteric circulation continues to be one of the most severe vascular conditions, characterized by persistently high mortality rates that have shown minimal decline over the past 15–20 years. This study analyzes the outcomes of surgical treatment in 84 patients with acute visceral blood flow disorders. In 52 (61.9%) cases, patients were diagnosed with acute thromboembolic or thrombotic occlusion involving the ostium and proximal segments of the superior mesenteric artery (SMA), while 32 (38.1%) patients exhibited thrombotic occlusion of its distal segments or intestinal branches. Mortality was observed in 24 (28.5%) cases. In patients with clinical suspicion of acute mesenteric ischemia, videolaparoscopy is recommended as an initial diagnostic approach to evaluate the abdominal cavity. Surgical procedures were carried out at various stages of disease progression.

Key words: mesenteric thrombosis, thrombotic occlusion, videolaparoscopy, superior mesenteric artery.

Introduction: Acute mesenteric circulatory disorders remain a challenging condition in terms of both diagnosis and management, with many issues still unresolved. One of the key reasons for delayed diagnosis is the lack of a characteristic, and especially pathognomonic, clinical presentation. The condition often mimics other diseases such as acute pancreatitis, acute cholecystitis, intestinal obstruction, foodborne infections, and gastrointestinal bleeding. As most of these conditions are typically managed conservatively rather than surgically, patients frequently receive initial non-operative treatment. This results in the loss of valuable time, which is critical for the early detection of acute mesenteric ischemia. The objective of this study was to enhance the effectiveness of diagnostic and therapeutic approaches for acute mesenteric circulatory disorders.

Materials and Methods: This study presents an analysis of surgical treatment outcomes in 84 patients diagnosed with acute mesenteric circulatory disorders who were treated at the multidisciplinary clinic of Samarkand State Medical University between 2015 and 2025. The patients' ages ranged from 38 to 84 years; among them were 60 men (71.4%) and 24 women (28.6%).

Acute thromboembolic or thrombotic occlusion affecting the ostium and proximal segments of the superior mesenteric artery (SMA) was identified in 52 (61.9%) patients, while thrombotic occlusion of the distal segments of the SMA or its intestinal branches was observed in 32 (38.1%) cases.

Upon admission, all patients with acute mesenteric circulatory disorders underwent comprehensive laboratory evaluation, including complete blood count, biochemical analysis, coagulation profile, and determination of blood group and Rh factor. Instrumental assessment included abdominal ultrasound and radiographic examination of the chest and abdomen in all cases. When indicated, patients with significant comorbid conditions were additionally evaluated by relevant specialists, such as a neurologist, internist, or cardiologist.

In the presence of clinical or instrumental signs suggestive of mesenteric arterial thrombosis or embolism, patients were considered candidates for videolaparoscopic intervention. In cases where laboratory and instrumental findings were inconclusive for acute mesenteric circulatory disorders, patients with alternative preliminary diagnoses (including acute cholecystitis, intestinal obstruction, acute pancreatitis, or various cardiac arrhythmias) were admitted to surgical or intensive care units for close monitoring and conservative management.

Videolaparoscopy was employed as a diagnostic modality in 17 (21.5%) patients, using a Karl Storz video system.

Results and Discussion: The vast majority of patients—76 (90.5%)—underwent surgery at advanced stages of the disease, namely intestinal necrosis or gangrene with peritonitis. Only 8 (9.5%) patients were operated on during the stage of intestinal ischemia.

In 8 (9.5%) cases, combined surgical procedures were performed, including resection of necrotic bowel with simultaneous restoration of main blood flow in the superior mesenteric artery (SMA) territory, followed in some cases by planned relaparotomies. In the remaining patients, isolated resection of necrotic bowel was carried out without a vascular reconstruction stage.

Isolated open direct or indirect thromboembolectomy from the SMA without bowel resection was performed in 2 (2.4%) patients. In 15 (17.8%) cases, due to extensive necrosis involving large segments of the small or large intestine, surgical intervention was limited to exploratory laparotomy with assessment of abdominal organs.

Overall mortality was 24 (28.5%). The primary causes of death were severe intoxication and progressive peritonitis.

Conclusions. Thus, videolaparoscopy is recommended as the initial diagnostic modality for evaluating the abdominal cavity in patients with suspected acute mesenteric circulatory disorders. The development of peritonitis, shock, and severe intoxication significantly contributes to adverse outcomes and is frequently the leading cause of mortality in these patients. Severe intoxication significantly contributes to adverse outcomes and is frequently the leading cause of mortality in these patients.

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