

Outcome After LateralPancreaticojejunostomy In Chronic Pancreatitis



Medical Science

KEYWORDS :

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ABSTRACT

Chronic pancreatitis with chronic abdominal pain and dilated pancreatic duct with or without stones. These patients treated with Decompressive(pancreatico-enteric anastomosis).The record of 20 patients treated with LPJ at the Civil Hospital Ahmedabad from 2013 to 2015 were reviewed. Preoperative assessment done. All patients treated with lateral pancreaticojejunostomy other patients with also treated for complications. Indication and outcome measure in postoperatively. The cause of chronic pancreatitis were alcohol abuse in 10 (50%), gall stone pancreatitis in 6 (30%) and idiopathic in 4 (20%) patients.Pain relief in immediate postoperative period was impressive in 80% patients, rest 20% patients complain mild pain. No new postoperative endocrine and exocrine insufficiency.. No patient required hospitalization or operation for postoperative complications. Outcome in immediate postoperative period was impressive after lateral pancreaticojejunostomy (LPJ).

INTRODUCTION

Chronic pancreatitis usually associated with pancreatic duct dilation, duct stricture, multiple duct stone and manifest as intractable abdominal pain. These patients treated with Decompressive(pancreatico-enteric anastomosis) surgical procedures, most commonly use procedure is “modified puestow” (Partington-Rochelume) lateral pancreaticojejunostomy. This study evaluated the outcome and overall patient health status after lateral pancreaticojejunostomy (LPJ) in 20 patients managed during a period from 2013 to 2015 at Civil Hospital, Ahmedabad.

MATERIALS AND MATHEDOLOGY

The record of 20 patients treated with LPJ at the Civil Hospital Ahmedabad from 2013 to 2015 were reviewed by hospital inpatient and outpatient records and telephone interview. Postoperative patient follow up ranging from 2 to 17 month. The principal indication for operation was chronic pain, intractable to medical management, associated with dilation(10mm or more) of the main pancreatic duct(MPD) with or without stone. Outcome measure in term of post-operative continue analgesic medication use, alcohol use, recurrent pain, recurrent hospitalization for complications of pancreatitis, subsequent operations for complications of chronic pancreatitis, associated major endocrine and exocrine insufficiency.

PREOPERATIVE ASSESSMENT

A complete history, examination and nutritional assessment was made. All patients had complain of chronic severe upper abdominal pain radiating to back which was intractable to medical management. Interestingly no patient had diabetes. Two patients on pancreatic enzyme supplementation. All of the patients had ultrasonography(USG) of abdomen and computed tomographic scans of the abdomen. All patient had MPD dilated 10mm or more with multiple MPD stone in 8 patients. Two patients had magnetic resonance cholangiopancreatography (MRCP) to know anatomy of main pancreatic duct and one patient had U.G.I.scopy for oesophageal varices due to portal hypertension.

OPERATIVE TECHNIQUE

The loop lateral pancreaticojejunostomy “modified puestow” (Partington-Rochelume) procedure was used. Abdomen open by bylateral subcostal incision. Pancreatic duct accessed by palpation and confirm by by needle aspiration. Hipaticobilliary system also accessed. Biopsy of a portion of the pancreas and pancreatic duct taken. The pancreatic duct open along full length and calculi removed.

Lateral pancreaticojejunostomy(PJ) done in single layer continue interlocking with polypropylene 2-0 suture at approx 30 cm distal to duodenojejunal (DJ)junction. A side to side jejunoejunal(JJ) anastomosis by silk 2-0 in double layer at 30 cm distal to PJ done.

MANAGEMENT OF COMPLICATIONS

In 5 patients LPJ was combined with other procedures to manage associated complications and other problems. One patient had a pseudocyst in the head that was managed by internal drainage into MPD. One patient had terminal biliary strictures were treated with choledochoduodenostomy. In 6 patients had chronic calculus cholecystitis treated with cholecystectomy.

RESULT

Patient Demographics

Total 20 patients 16 male and 4 female. The mean age of the 20 patients was 37.05 years (range from 17 to 55 years). The cause of chronic pancreatitis were alcohol abuse in 10 (50%), gall stone pancreatitis in 6 (30%) and idiopathic in 4 (20%) patients.

Postoperative Outcomes

Pain relief in immediate postoperative period was impressive in 80% patients, rest 20% patients complain mild pain and continue use analgesic medication. No continue use of alcohol present in any patient. No postoperative insulin required in any patients for endocrine insufficiency. Pancreatic enzymes use continue in one patient for exocrine insufficiency. No patient required subsequent hospitalization or operation for chronic pancreatitis or for postoperative complications. There are no immediate postoperative mortality noted.

DISCUSSION

Chronic pancreatitis is characterise by inflammation and irreversible pancreatic paranchymal damage due to fibrosis associated with atrophy of the pancreatic parenchyma. Most common cause is heavy alcohol consumption, other are chronic duct obstruction, trauma, pancreatic divisum, cystic dystrophy of the duodenal wall, hyperparathyroidism, hypertriglyceridemia, autoimmune pancreatitis, tropical pancreatitis, and hereditary pancreatitis and idiopathic pancreatitis. It is associated with chronic pain, multiple pancreatic duct stone, duct stricture and endocrine-exocrine insufficiency that significantly decrease the quality of life of these patients. Pain commonly occurs due to ductal hypertension and associated with duct dilatation. Intractable pain with dilated MPD >7 mm due to MPD stone

or stricture require a decompressing procedure.

lateral pancreaticojejunostomy (modified Puestow) procedure is the most common surgical technique use in such cases ,whereas longitudinal anastomosis ensures full drainage and decompression of the whole duct length. It provide good pain relief .Postoperative morbidity and mortality lower than among those who had the original Puestow procedure. The main advantage offered by this procedure is parenchymal conservation, which preserves endocrine and exocrine function.

Decompressive procedures temporarily relieve the ductal obstruction but long term outcome not good and in most cases, they do not modify the natural history of the disease and chronic pancreatitis progresses.

CONCLUSION

Outcome in immediate postoperative period was impressive after lateral pancreaticojejunostomy (LPJ). Many patients indicated the pain for which they sought medical attention was improved or absent. It provided good pain relief with paranchymal conservation and had a low morbidity and mortality in early postoperative period.

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