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Pancreaticojejunostomy - Risk Anastomosis after Cephalic Pancreaticoduodenectomy

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Abstract

Introduction: The authors bring to attention pancreaticojejunal anastomosis (PJA) performed after cephalic pancreatico-duodenectomy (CPD). This type of anastomosis is renowned for its high risk of complications. Among these complications, pancreatic fistula (PF) is distinguishable due to a significant frequency, averaging 10%. It is perhaps the most unsafe type of anastomosis in digestive surgery, due to its pancreatic partnership. Performing a sealed APJ can be considered a great achievement: a digestive lumen is set in contact with a brittle parenchymal structure, centred by a delicate excretory channel, difficult to anastomose in itself.

Material and methods: We studied two distinct groups of patients undergoing CPD. A first group - 58 cases operated on between 1967 and 1983, and the second one - 70 cases operated on between 1984 - 2013. In all cases we performed PJA; by in-continuity loop technique in the first group, and with separate loop in the second group. In the second group we used a variant own technique that does not allow anastomotic loss of pancreatic fluid. Thus, a decline in the incidence of PF from 20% to 8% was obtained, the final percentage corresponding to group two. Of the 8% of patients with PF losses were recorded strictly at pancreatic level, with no bile or food contamination. Stenting was recorded for biliary- and pancreaticojejunal anastomoses in group two.

Discussions: The percentage of PF after CPD did not show any notable revival when comparing the 1980s period to the present. Also, mortality due to FP is approaching 40%, a daunting figure. The multitude of technical options for restoring bowel movement after CPD, over 80 procedures, further confirms the lack of safety and trust in relation to PJA. The authors bring forward several surgical gestures addressing PJA, gestures capable of providing an 8% frequency of PF, percentage which we consider to be reasonable.

Conclusions: The authors consider PJA stenting mandatory. Placing an isolated PJA on the short branch of the "Y", separate from the biliary and food flow, prevents the formation of a complex fistula. The proposed technique does not require a "duct - to - mucosa" type or "telescoping" type pancreatico-jejunal anastomosis.

Key words: pancreaticojejunostomy, cephalic pancreaticoduodenectomy, pancreatic fistula

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