Introduction

- Yearly, 64,000 people in the United States are diagnosed with pancreatic cancer
- 90% of cases are exocrine tumors
- Less than 2% are pancreatic neuroendocrine tumors (PNETs)
- This case highlights a rare case of a patient with recurrent PNET and type 3c diabetes

Case Description

A 60-year-old male with history of type 2 diabetes mellitus on insulin and PNET s/p distal pancreatectomy presented with abdominal pain and watery diarrhea.

Labs: unremarkable CBC, CMP, lipase, insulin, gastrin, glucagon, serotonin, urine 5-HIAA. Elevated Chromogranin A (116 ng/mL), VIP (123 pg/mL), pancreatic polypeptide (526 pg/mL)

Imaging:
- CT Abdomen and Pelvis: negative for acute pathology
- Somatostatin receptor PET Scan: small focus of activity in the pancreatic body (Figure 1)

Outpatient and Hospital Course:
- Trialed on somatostatin analogs → did not help abdominal pain or diarrhea
- Admitted for second distal pancreatectomy with pathology revealing recurrent PNET (Figure 2a & 2b)
- Hospital stay complicated by hyperglycemia and labs showing inappropriately low C-peptide (0.2 ng/mL) → diagnosed with type 3c diabetes.

Discussion

- PNETs are a very rare type of cancer that can secrete various functioning and nonfunctioning substances
- Treatment for a functional PNET → surgical resection
- Complications after pancreatectomy: infection, bleeding, pancreatic fistulas, and the development of diabetes requiring insulin
- Type 3c diabetes is seen in patients with chronic pancreatitis, ductal adenocarcinoma, and a history of distal pancreatectomy

References