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We are going to be talking about AXIOS, selecting the patient, selecting the timing for intervention, and selecting the appropriate therapeutic plan for intervention. The patients we're going to be talking about today are those patients with acute pancreatitis and acute pancreatic fluid collection with or without necrosis. Now, clearly, patients with chronic pancreatitis can develop collections that require AXIOS stent drainage. But today we're going to be talking about the patient after acute pancreatitis.

Now, we often think about the indication for drainage of a fluid collection with the AXIOS stent. But when accessing a pancreatic fluid collection or walled-off necrosis, we really must not trivialize the procedure and should only perform the procedure when it's absolutely indicated. The indications for accessing a pancreatic fluid collection or walled-off necrosis are an enlarging collection or a symptomatic collection. And the symptoms we talk about are those of fever, leukocytosis, pain, nausea, vomiting, feeding intolerance, jaundice, and persistent pancreatitis.

Now, if we look at these symptoms and we think about necrotizing pancreatitis, we understand that, essentially, all these symptoms and signs can be seen with patients with necrotizing pancreatitis. And the symptoms can be seen two weeks after, four weeks after, or even two months after the onset of necrotizing pancreatitis. So patients with necrotizing pancreatitis often have low-grade fever or a low-grade leukocytosis or pain. So the challenge for selecting a patient for using an AXIOS stent is determined when these symptoms are severe enough or persistent enough to undergo an intervention or when we can push through these symptoms to get a patient to a better time period for intervention.

Another thing that we need to do when we're looking at a patient with a pancreatic fluid collection is to exclude a cystic neoplasm, aneurysm, and pseudoaneurysm. And although this seems very straightforward and simple, mistakes are still made not infrequently. And so, when you're seeing a patient with a pancreatic fluid collection that does not have a history of acute pancreatitis or chronic pancreatitis, we really need to make a diagnosis of that fluid collection prior to placing an AXIOS stent.

In addition, if a patient has a fluid collection at presentation of acute pancreatitis, that fluid collection may not be the result of the pancreatitis. And, again, a diagnosis is necessary prior to considering intervention with an AXIOS stent.

Now, regarding the timing of intervention with an AXIOS stent, we tend to think a four-week minimum is necessary to develop the characteristics of a fluid collection that make AXIOS stent placement successful. And it is clear that the longer you can wait to intervene on a patient the better the patient outcome. What we're looking for in a pancreatic fluid collection is organization, consolidation, liquefaction, and wall formation.

And these images that I'll show you next will bring you through those characteristics of pancreatic fluid collections. So here's a patient who is two weeks out from necrotizing pancreatitis. And you see a very poorly-developed fluid collection around where you would think the pancreas should be.

Five weeks out from pancreatic necrosis, this is the same patient. Again, you do not see a well-developed wall. You see a bit of consolidation and organization of the collection. But eight weeks out from pancreatic necrosis, we see this collection. And this collection clearly shows you a developed wall, organization, consolidation, and liquefaction. And this is the appropriate patient if the patient's symptomatic to undergo an AXIOS stent drainage.