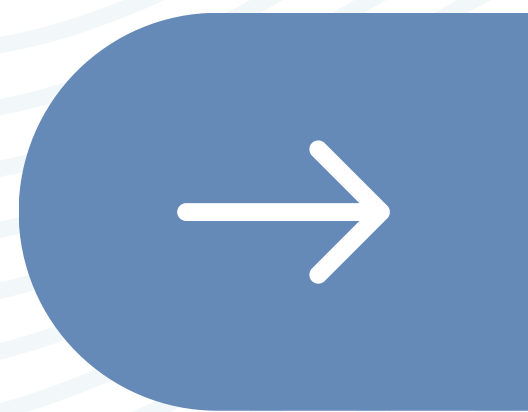


#DIBS BY NEXTILLO

DAILY INFORMATION BULLETIN SERVICE

CHOLANGITIS





#DIBSBYNEXTILLO

DAILY INFORMATION BULLETIN SERVICE

CHOLANGITIS

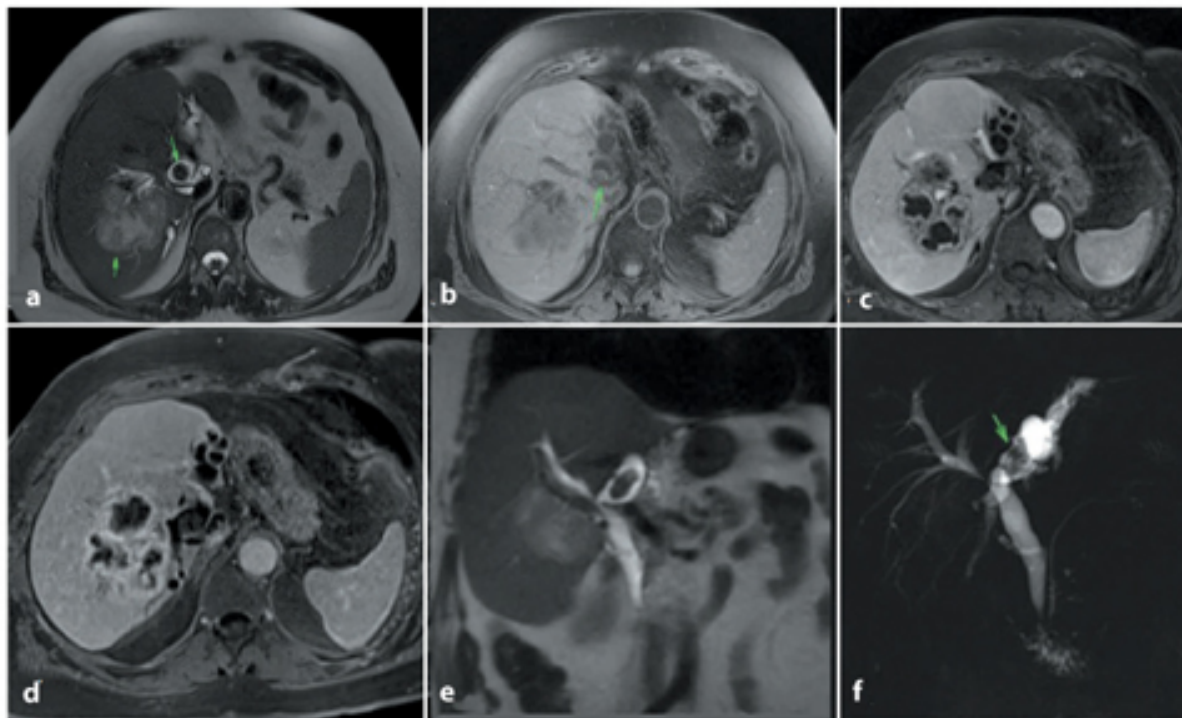
Cholangitis is inflammation of the bile ducts, caused by a bacterial infection.

Etiology:

Bacterial infection ascending from the duodenum, is a common cause. It can be associated with choledocholithiasis (presence of gallstones in the common bile duct) or other conditions leading to bile duct obstruction.



RADIOLOGY



A magnetic resonance cholangiopancreatography image shows dilatation of the entire biliary tree, with multiple hypointense intraluminal defects caused by stones.



PATHOPHYSIOLOGY

Bacterial Ascension:

Bacteria from the intestines, particularly the *duodenum*, ascend into the biliary tree. This ascent is often facilitated by conditions like *choledocholithiasis*, *strictures*, or other factors causing bile duct obstruction.

Biliary Stasis:

Stagnant bile provides an environment conducive to bacterial overgrowth and infection.

Bacterial Infection:

Bacteria, primarily gram-negative organisms like *Escherichia coli*, gain access to the bile ducts.

Inflammatory Response:

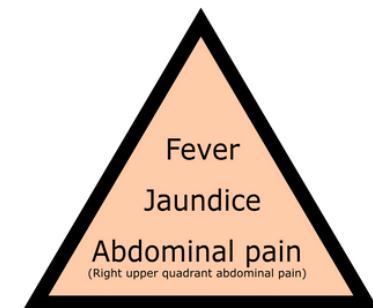
Inflammatory mediators are released, contributing to systemic symptoms and local complications.



CLINICAL FEATURES

Charcot's Triad:

- The classic triad of symptoms includes *fever, jaundice, and right upper quadrant abdominal pain.*
- This triad is a hallmark of cholangitis and helps in clinical diagnosis.



Charcot's cholangitis triad

Reynolds' Pentad (Severe Cases):

- In more severe cases, patients may exhibit *altered mental status and signs of shock, in addition to the classic triad.*
- This constellation of symptoms is known as *Reynolds' pentad.*

MC symptom of sepsis in Cholangitis is Chills.



DIAGNOSIS

- **Ultrasound:** Initial imaging to assess the biliary system and detect gallstones or ductal dilatation.
- **CT Scan:** Provides detailed images of the abdominal area and helps identify biliary obstructions, inflammation, or abscesses.
- **Magnetic Resonance Cholangiopancreatography (MRCP):** Non-invasive imaging to visualize the bile ducts and identify any abnormalities.
- **Invasive Procedure:** Combines endoscopy and fluoroscopy to directly visualize the bile ducts, obtain samples, and perform therapeutic interventions like stone removal.
- **Percutaneous Transhepatic Cholangiography (PTC):** Involves injecting contrast dye into the liver to visualize the bile ducts, especially in cases where ERCP is not feasible.
- **Blood Cultures:** Obtaining blood cultures to identify the specific bacteria causing the infection can guide antibiotic therapy.



MANAGEMENT

Antibiotic Therapy:

- *Broad-spectrum antibiotics are initiated promptly to target the bacterial infection.*
- *Empirical coverage often includes agents effective against gram-negative bacteria.*

Biliary Drainage:

- *Endoscopic Retrograde Cholangiopancreatography (ERCP) is Preferred for both diagnosis and therapeutic intervention. It allows for the removal of stones and the placement of stents to relieve biliary obstruction.*
- *Percutaneous Transhepatic Cholangiography (PTC) is an alternative when ERCP is not feasible, involves draining the bile duct externally.*



CHOLANGITIS

Question :

What is the classic triad of symptoms associated with cholangitis?

- A. *Fever, abdominal pain, nausea*
- B. *Jaundice, fever, cough*
- C. *Fever, jaundice, right upper quadrant abdominal pain*
- D. *Diarrhea, abdominal bloating, constipation*

Answer:

C. *Fever, jaundice, right upper quadrant abdominal pain*