Discovery of Amyloidosis Through Cholelithiasis

Abstract
Amyloidosis is a rare systemic disease that can affect one or multiple organs. Involvement of the gallbladder is unusual. Diagnosis is made after Congo red staining in histology. We report one case of a female patient consulting for hepatic colic, diagnosed with cholelithiasis and was operated on by laparoscopy, with uneventful course. Histology proves after Congo red staining the diagnosis of Amyloidosis in the gallbladder. Amyloidosis is a rare disease that exceptionally affects the gallbladder. There is no effective radical treatment up to date. This disease may quickly lead to fatal consequences if symptomatic treatment was not early given.

Keywords
Amyloidosis; Gallbladder; Laparoscopic cholecystectomy; Congo red staining

Introduction
Amyloidosis is a rare systemic disease that can affect one or multiple organs [1]. It is due to a deposit of amorphous and structure less protein substance in the interstitial extracellular space. Type AA amyloidosis is usually due to a chronic inflammation, chronic pyelonephritis, tuberculosis, and is usually diagnosed in the kidney, salivary glands, spleen and liver. Involvement of the gallbladder is unusual [1]. Diagnosis can only be confirmed after histological examination with Congo red staining. Monitoring and research of other damage is necessary as well as the early medical treatment to prevent fatal consequences.

Observation
We report the case of 77 years-old with a history of arterial hypertension, coronary artery disease and heart failure, who consulted for hepatic colic, appeared since one month. Physical examination revealed the presence of tenderness in the right hypochondrium radiating in ramp at the tip of the right scapula without palpable mass or conjunctival jaundice, all in a context of apyrexia. A biological assessment has been done showing no chemical or hematological abnormalities. An abdominal ultrasound was then realized that showed the presence of a non-distended thickened wall gallbladder with fluid content and multiple stones, the intra-and extra hepatic biliary ducts were thin and kidneys were of normal size. The patient was medically prepared for a laparoscopic cholecystectomy using 4 trocars with extraction of the specimen in a bag. The postoperative course was uneventful, and the patient left the hospital the next day with medical treatment. The histological report has concluded to lesions of calculous chronic cholecystitis with a sub acute attack and dense pericholecystic amyloid deposits after staining with Congo red (Figure 1 and 2). It was AA amyloidosis. The patient was placed under non-steroidal anti-inflammatory treatment with distant medical follow-up.

Conclusion
AA amyloidosis is a rare disease that can cause fatal consequences in the long term. Reaching the gallbladder is very rare [2]. Symptomatic treatment and treatment of the etiology is often necessary to prevent the complications of disease and death.

References

Figure 1: Multiple pericapillar amyloidosis.

Figure 2: Extracellular amyloidosis with normal biliary epithelium.