

A Misleading Presentation of Gallstone Pancreatitis Caused by Leptospirosis

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Introduction

- Leptospirosis is a common zoonotic infection with presentation ranging from mild influenza-like symptoms to deadly multi-organ failure.
- Pancreatic involvement, including isolated hyperlipasemia, is rarely seen in Leptospirosis and is mainly caused by vascular damage.

Case Presentation

- A 45 year old male with a past medical history of hypertension presented with a one week evolution of nausea, non-bloody/non-bilious emesis, fever, epigastric pain, pale diarrhea, and anorexia.
- Vital signs were remarkable for tachycardia.
- Physical examination revealed bilateral scleral icterus, dry oral mucosa and severe epigastric tenderness.
- Laboratory workup disclosed stable platelets and hemoglobin, WBC of 24,000/mm³, creatinine of 2.77 mg/dL, with associated azotemia.
- Liver function enzymes revealed elevated total/direct bilirubin (12.62/11.84 mg/dL), GGT (372 U/L), alkaline phosphatase (143 U/L), and mildly elevated AST with negative viral hepatitis markers.

Case Presentation

- Lipase levels showed increasing trend from 375 to 467 (n= 0-160 U/L).
- Patient was subsequently admitted under the diagnosis of gallstone pancreatitis for which aggressive IV hydration, IV antibiotics and symptomatic treatment was initiated with little improvement.
- Abdominal ultrasound revealed hepatomegaly with no biliary ductal dilatation, visible gallstones, or pancreatic abnormalities.
- Magnetic resonance cholangiopancreatography showed no evidence of cholelithiasis, choledocholithiasis, cholecystitis or pancreatitis.
- Abdominopelvic computed tomography disclosed no evidence of intra-abdominal pathologies.
- On day #4 patient presented with bilateral conjunctival suffusion which raised concern for Leptospirosis for which serology was ordered.
- Patient was initiated on oral Doxycycline therapy with subsequent improvement of symptoms and laboratory parameters.
- IgM Leptospira antibody test was positive.
- On day #6 patient left against medical advice

Conclusion

- Rare cases have described pancreatitis caused by Leptospirosis without imaging confirmed structural changes of the pancreas which creates a diagnostic challenge for physicians.
- This case demarcates the importance of Leptospirosis awareness and high clinical suspicion warranted in order to allow for early diagnosis, prevent treatment delay and avoid unnecessary imaging or interventions.

References

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