

## **Spontaneous Rectus Sheath Hematoma Triggered by Severe Coughing: A Case Report**

Authors: Claire Karcher, Alison delCorral, Merrick Firoz, Jason Onwenu, Autumn Collins, Michael Modica

### **Abstract**

Background: Rectus sheath hematoma (RSH) is a rare but important cause of acute abdominal pain that can mimic intra-abdominal surgical emergencies. Spontaneous RSH typically occurs in patients with coagulopathy or those on anticoagulation therapy, while cases in patients without these risk factors are uncommon. Sudden increases in intra-abdominal pressure, such as from severe coughing, may precipitate hematoma formation.

Case Presentation: 61-year-old male with a history of asthma, hypertension, hypokalemia, and prior myocardial infarction presented with three days of progressive left-sided chest and abdominal pain following the onset of a dry, nonproductive cough. CT imaging revealed a large intramuscular hematoma of the right rectus abdominis muscle, with interval enlargement on repeat imaging. The patient was hemodynamically stable and managed conservatively with pain control, cough suppression, and an abdominal binder, resulting in gradual clinical improvement without the need for surgical intervention.

Conclusion: This case illustrates spontaneous RSH as a rare complication of severe coughing in patients without antiplatelet or anticoagulation therapy. Clinicians should consider RSH in the differential diagnosis of acute abdominal pain following episodes of forceful coughing, and CT imaging is critical for diagnosis and management.