Open and Shut

### Prompt:  
  
"I am presenting a 34-year-old female patient who presented to the emergency department with sudden onset of severe abdominal pain, fever, and an elevated heart rate. She recently had what she described as a non-traditional open marriage, which has caused emotional stress and led her to seek support outside of her relationship.   
  
Upon examination, the patient also demonstrated weakness and loss of sensation in her legs, which led us to suspect a possible neurological complication. Initial lab tests showed no clear infection and imaging studies ruled out any obvious source of abdominal pain, such as a mass or obstruction.  
  
Considering her symptoms and background, particularly her openness with relationships and subsequent anxiety, what differential diagnoses should be considered? What specific tests or evaluations would be necessary in order to narrow down the cause of her symptoms?"  
  
### Expected LLM Response:  
  
"In this patient case, the combination of sudden abdominal pain, fever, and neurological symptoms such as weakness and sensory loss raises concern for several potential diagnoses.  
  
\*\*Differential Diagnoses:\*\*  
  
1. \*\*Henoch-Schönlein Purpura (HSP):\*\* Given the patient's acute abdominal pain, fever, and potential skin findings that may be subtle or internal (like a rash in the mouth), HSP can present with these symptoms due to the immune-mediated process affecting small blood vessels, leading to abdominal pain and even renal involvement.  
  
2. \*\*Intestinal Intussusception:\*\* This is characterized by the 'telescoping' of part of the intestine into itself, which may present with sudden onset of abdominal pain and could explain the acute nature of her symptoms.   
  
3. \*\*A Clotting Disorder:\*\* Patients may present with abdominal pain due to mesenteric ischemia from a clot and develop weakness or neurological symptoms secondary to systemic effects.   
  
4. \*\*Autoimmune Conditions:\*\* Other possible autoimmune diseases such as vasculitis or systemic lupus erythematosus could also explain the combination of symptoms, particularly if there is an undiagnosed underlying condition.  
  
\*\*Recommended Diagnostic Tests:\*\*  
  
1. \*\*Complete Blood Count (CBC) and Comprehensive Metabolic Panel (CMP):\*\* These are essential to assess for signs of infection, inflammation (like elevated eosinophils), or organ dysfunction.  
  
2. \*\*Ultrasound of the Abdomen:\*\* To check for potential intussusception or any other abdominal pathology.  
  
3. \*\*MRI or CT Scan of the Abdomen:\*\* After initial findings, these imaging modalities might have better sensitivity for diagnosing conditions like intussusception or identifying underlying masses.  
  
4. \*\*Lumbar Puncture (LP):\*\* If neurological symptoms persist, consider examining the cerebrospinal fluid (CSF) for potential autoimmune or infectious causes.  
  
5. \*\*Skin Exam for Purpura:\*\* Given a history of recent emotional trauma, look for physical signs of HSP, particularly around the abdomen or legs.  
  
Considering her recent emotional stressors, HSP would warrant specific attention, especially if we can correlate these symptoms with a bee sting or other identified triggers. Close monitoring and further imaging would be crucial for guiding treatment."  
  
### DISEASE:  
Henoch-Schönlein Purpura