

## Case Scenarios For Critical Thinking Frameworks\*

### 1. MD Intern/student

A 6 week old baby is admitted with vomiting. The intern on rounds presents his assessment and plan:

“In assessment, Vinny is 6 weeks old and he presented with acute onset of vomiting and loose stools for the past 2 days without fever or known sick contacts. For patients who are this young, in addition to the usual things, you have to consider anatomic abnormalities like pyloric stenosis, duodenal atresia, malrotation, and you may consider intussusception too but he’s a little young for that. It might be just bad reflux, or maybe a formula allergy, or maybe he just has swallowed a lot of air and has gas. I suppose it could also be from a head injury, or maybe an ear infection, or a urinary tract infection too. But I think it’s most likely a viral gastroenteritis. So, our plan will be to give IV fluids and he can be discharged when he is drinking well.”

**What aspects of critical thinking did this intern demonstrate? What could this intern do to improve?**

*[Hint: Can this student prioritize a differential and support a diagnosis?]*

**Use a Critical Thinking Framework to help this Intern improve his/her assessment.**

### 2. SW Intern

A 3 month old girl is in the ED with a femur fracture. The social work intern presents the case to her supervisor:

“Ariel is a 3 month old girl with a fracture of the femur bone in her leg. Her parents brought her in today after they noticed that her leg was swollen and she wasn’t using it as much. The ED MD’s noticed a lot of swelling in her thigh, and an x-ray confirmed the leg fracture. Neither of her parents has an explanation for the injuries. The staff in the ED are concerned for inflicted injury. I would like to call the Child Protection Team and file a mandated report with DCF.”

**What aspects of critical thinking did this intern demonstrate? What could this intern do to improve?**

*[Hint: What information has this intern omitted that may contribute to the formulation? Are there other possibilities to think about?]*

**Use a Critical Thinking Framework to help this Intern improve his/her assessment.**

3. RN student

A 10 year old has been admitted with asthma, and seems to be getting worse despite treatment. The nursing student is talking with her supervisor about her concerns that the patient needs a higher level of care. Vital signs on admission: RR 20, Pox 90% on RA; Vital signs now: RR 40, Pox 90% on 2L oxygen via NC, with poor aeration and lots of wheezing on exam:

“Katie is 10 years old and has a history of poorly controlled asthma, and was admitted with an asthma exacerbation triggered by her seasonal allergies. I am worried about her breathing, because she seems to be getting worse rather than better even though she is on oral steroids and I’m giving her albuterol every 2 hours.”

**What aspects of critical thinking did this student demonstrate? What could this student do to improve?**

*[Hint: Can this student support his/her assertion that the patient is getting worse?]*

**Use a Critical Thinking Framework to help this Student improve his/her assessment.**

4. Psychology intern

A 16 year old girl with depression was referred to the ED from her PCP’s office after she expressed having thoughts of self-harm. The psychology intern is presenting his formulation to his preceptor:

“Amanda is 16 years old and lives in Boston, MA with her parents and 14 yo brother. She has a history of depression and was brought to the ED from her PCP’s office where she was being seen for a follow up visit and disclosed thoughts of cutting herself. Biologically she is predisposed to depression given a strong family history. Psychologically, she has a history of depression. And socially, she has started in a new school recently and has had difficulty making friends. Due to concerns for safety and SI, she would benefit from inpatient level of care.”

**What aspects of critical thinking did this intern demonstrate? What could this intern do to improve?**

*[Hint: Can this intern support his/her assertion that the patient requires inpatient care?]*

**Use a Critical Thinking Framework to help this intern improve his/her assessment.**

\*Thank you to Amanda Growdon for use of the originally developed case scenarios