1.19 SYNCOPE

Syncope is defined as a transient loss of consciousness that results from cerebral hypoperfusion. Characteristically, it is abrupt in onset, short-lived, and resolves spontaneously. Presyncope is a term used to describe a near-syncopal event involving identical pathophysiology as syncope; however, the patient does not fully lose consciousness. Syncope affects approximately 1 million Americans every year and accounts for 6% of all hospital admissions. 1-4 Approximately 1 in 3 persons will experience a syncopal event at least once in their lifetime.^{2,4,5} The condition reflects the end-point of myriad processes ultimately leading to a disruption in the oxygen supply to the brain. It is most commonly caused by systemic hypotension accompanied by cerebral hypoperfusion. Syncope-related mortality varies depending on the etiology and is higher in persons with underlying cardiovascular disease.^{3,6} Although many etiologies of syncope are self-limited and benign, hospitalists must be able to identify patients who may have serious underlying diseases, as well as those at high risk for complications from a syncopal event. Hospitalists should evaluate whether diagnostic tests are indicated and curtail their routine use in patients with simple syncope for whom there is little clinical value.⁷ Furthermore, hospitalists must balance the tempo and depth of an inpatient evaluation to safely assess patients before effectively transitioning them to the outpatient environment. Hospitalists can facilitate the evaluation and management of syncope to improve patient outcomes and decrease healthcare costs associated with identifying and managing this condition.

KNOWLEDGE

Hospitalists should be able to:

- Define syncope.
- Differentiate syncope from other causes of loss of consciousness, such as seizure.
- Explain the physiologic mechanisms that lead to reflex or neurally mediated syncope.
- Identify common causes of neurally mediated syncope such as neurocardiogenic, carotid sinus, and situational syncope.
- Identify conditions associated with orthostatic hypotension that may result in syncope.
- Identify medications that may contribute to, or cause, syncope.
- Identify common cardiac etiologies for syncope, including structural heart disease or dysrhythmia.
- Identify uncommon pulmonary or vascular etiologies for

- syncope, such as pulmonary embolism or vertebrobasilar insufficiency.
- Recognize associated metabolic conditions that may trigger loss of consciousness such as hypoglycemia.
- Describe risk factors that place patients at higher risk for poorer outcomes and/or complications secondary to syncope.
- List the indications that require inpatient evaluation of syncope.
- Recognize indications for specialty consultation, such as cardiology or neurology.
- Outline an evidence-based strategic process to evaluate patients with syncope.

SKILLS

Hospitalists should be able to:

- Elicit a thorough and relevant medical history, perform a physical examination, and review the medical record to identify factors that led to the development of syncope.
- Accurately assess patients' volume status and use appropriate special maneuvers to complement the physical examination to identify underlying etiologies of syncope or other causes that may mimic syncope.
- Determine which patients require evaluation of syncope as an inpatient.
- Identify the most appropriate care setting and monitoring requirements for patients admitted for a syncope evaluation (with judicious but appropriate use of continuous telemetry, pulse oximetry, and seizure precautions).
- Formulate a logical diagnostic plan to determine the cause of syncope, while avoiding diagnostic tests that are rarely indicated (such as carotid ultrasonography) except in selected circumstances.
- Order and interpret indicated laboratory studies to evaluate for underlying conditions that may contribute to, or cause, syncope.
- Appropriately order more advanced diagnostic studies to guide a syncope evaluation, seeking guidance from specialists when necessary to interpret the results.
- Determine an appropriate plan to manage syncope once the etiology has been identified.
- Communicate with nursing teams and implement appropriate precautions to prevent inpatient falls in patients admitted with syncope.
- Communicate with patients and families to explain the etiology of syncope and the importance of recognizing and preventing recurrent syncope.
- Communicate with patients and families to explain the associated risks, required monitoring, and appropriate management of syncope.
- Document the treatment plan and provide clear discharge instructions for postdischarge clinicians.

ATTITUDES

Hospitalists should be able to:

- Follow evidence-based recommendations when managing hospitalized patients with syncope.
- Work collaboratively with primary care physicians and emergency physicians in making admission decisions.
- Acknowledge the opportunity to decrease mortality, length of stay, and healthcare costs by identifying and managing complications of syncope.

SYSTEM ORGANIZATION AND IMPROVEMENT

To improve efficiency and quality within their organizations, hospitalists should:

• Lead, coordinate, and/or participate in multidisciplinary initiatives to promote patient safety and optimize diagnostic and management strategies for syncope.

• Lead, coordinate, and/or participate in efforts to apply high-value care to the evaluation of a patient with uncomplicated syncope (eg, avoidance of neuroimaging and carotid ultrasonography).

References

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