7/20/23 Morning Report with @CPSolvers

"One life, so many dreams" Case Presenter: Ximena (@) Case Discussants: Rabih (@rabihmgeha) and Mario (@mariosuitofmd)

CC: 74 year old male came to the ER for sudden syncopal episode.

HPI: Patient lost consciousness while grocery shopping when he was standing in the counter. His wife witnessed the event and described that he lost consciousness for 5 minutes and was alert and oriented after it. He only remembers when he was in the ambulance. He did not report any prodrome, chest pain, lightheadedness, visual disturbances or shortness of breath.

PMH:
Type 2 diabetes
Hyperlipidemia
HTN

Meds:
Losartan
Levemir
Atorvastatin
Insulin
Humalog w/ meals

Fam Hx:

Soc Hx: recently retired from work. Lives with his daughter

Health-Related Behaviors:
No smoking/alcohol

Allergies:

Vitals: T: afebrile **HR:** 59 **BP:** 140/79 **RR:** 14 **SpO2** 99%
Exam:
Gen:
HEENT: Occipital laceration from the fall.
CV: nl
Pulm: nl
Abd: nl
Neuro: no focal deficits, alert and oriented.
Extremities/skin: nl

Notable Labs & Imaging:
Imaging:
EKG: Sinus bradycardia, left bundle branch block and right superior axis deviation. LBBB does not fulfill Sgarbossa criteria for ACS.
CXR: normal
Head CT: normal
TTE: LVEF 20-25%. Septal and apical hypokinesis. Diastolic dysfunction grade 1. Concentric left ventricular hypertrophy.

Patient stopped performing physical activity after retiring. Non-compliant with medications and poor follow-up with his cardiologist. He went on telemetry and was programmed to follow up with an angiogram.

Final dx: Heart failure with reduced ejection fraction

Problem Representation: 74 year old transient loss of consciousness without a trace.

Teaching Points (Debora):
CC: Syncope → loss of consciousness, causes: Hypoglycemia, stroke, seizure.
Ddx: SNC: Cerebral transitory hypoperfusion, Parkinson. Cardiopulmonary causes: severe estenosis, acute coronary syndrome, aortic dissection, arrhythmia. Orthostasis: hypovolemia, anticholinergic drug, diabetes. Reflex: vasovagal (e.g. increase of the parasympathetic tone for prolonged standing).
Management: First step**:** Check the vital signs. Second step: Get the history of the patient: HPI, HPM, etc.
Prodrome of the episode: vasovagal usually present with visual disturbance. Time: 5 minutes is unspecific, can be subjective. The patient could had a seizure or contusion of head trauma (hemorrhage).
DBT can cause stroke causing a seizure, hypovolemia, hypoglycemia. DBT increase the risk of syncope!
4 categories: hypovolemia, autonomic dysfunction, vasovagal and cardiac (mechanical: estenosis, pericardial effusion, PE or arrhythmia → discharge of electrical activity e.g. Atrial or Ventricular fibrillation). Order an EKG, see if there is a clue, e.g. Prolonged PR, QRS, elevated ST.
Ask: How was the patient before? He had syncope or palpitation?
EKG: Right superior axis deviation and LBBB. The heart is abnormal, a conduction system disease. Ddx: High vagal tone or structural heart disease.
Cardiogenic syncope: evidence in the EKG and TTE. The patient has Heart failure and reduced LVEF. Possible causes → ventricular arrhythmia, progressive conduction disease (sinus node dysfunction or av node dysfunction).
Hypokinesis: normally seen in a old MI. Order troponins.
Heart failure can present in **phases:** Initial reduce cardiac output can cause less symptoms, when is less than 50% the patient can really feel during exercise.