Remember acronym to assist in decision making for referral to advanced heart failure specialist:

I-NEED-HELP (also see *Table 6*)

I: IV inotropes

N: NYHA IIIB/IV or persistently elevated natriuretic peptides

E: End-organ dysfunction

E: Ejection fraction ≤35%

D: Defibrillator shocks

H: Hospitalizations >1

E: Edema despite escalating diuretics

L: Low blood pressure, high heart rate

P: Prognostic medication – progressive intolerance or down-titration of GDMT

Information Source: [2017 ACC Expert Consensus Decision Pathway for Optomization of Heart Failure Treatment: Answers to 10 Pivotal Issues About Heart Failure with Reduced Ejecton Fraction … (click to download)]

Table 6

Triggers for HF Patient Referral to a Specialist/Program

1. New onset HF (regardless of EF) for evaluation of etiology, guideline-directed evaluation and management of recommended therapies, and assistance in disease management.

2. Chronic HF with high-risk features, such as development of 1 or more of the following risk factors:
- ▪ Need for chronic IV inotropes
- ▪ Persistent NYHA functional class III–IV symptoms of congestion or profound fatigue
- ▪ Systolic blood pressure ≤90 mm Hg or symptomatic hypotension
- ▪ Creatinine ≥1.8 mg/dL or BUN ≥43 mg/dL
- ▪ Onset of atrial fibrillation or ventricular arrhythmias or repetitive ICD shocks
- ▪ Two or more emergency department visits or hospitalizations for worsening HF in prior 12 months
- ▪ Inability to tolerate optimally-dosed beta blockers and/or ACEI/ARB/ARNI and/or aldosterone antagonists
- ▪ Clinical deterioration as indicated by worsening edema, rising biomarkers (BNP, NT-proBNP, others), worsened exercise testing, decompensated hemodynamics, or evidence of progressive remodeling on imaging
- ▪ High mortality risk using validated risk model for further assessment and consideration of advanced therapies (http://www.onlinejacc.org/content/62/16/e147/T10)

3. To assist with management of GDMT, including replacement of ACEI or ARB therapy with ARNI for eligible patients, or to address comorbid conditions such as chronic renal disease or hyperkalemia, which may complicate treatment.

4. Persistently reduced LVEF ≤35% despite GDMT for ≥3 months for consideration of device therapy in those patients without prior placement of ICD or CRT, unless device therapy contraindicated.

5. Second opinion regarding etiology of HF; for example:
- ▪ Evaluation for potential ischemic etiology
- ▪ Suspected myocarditis
- ▪ Established or suspected specific cardiomyopathies, e.g., hypertrophic cardiomyopathy, arrhythmogenic right ventricular dysplasia, Chagas disease, restrictive cardiomyopathy, cardiac sarcoidosis, amyloid, aortic stenosis.
- ▪ Valvular heart disease with or without HF symptoms

6. Annual review for patients with established advanced HF in which patients/caregivers and clinicians discuss current and potential therapies for both anticipated and unanticipated events, possible HF disease trajectory and prognosis, patient preferences, and advanced care planning.

7. Assess the possibility of participation in a clinical trial.

ACEI = angiotensin converting enzyme inhibitors; ARB = angiotensin receptor blockers; ARNI = angiotensin receptor-neprilysin inhibitor; BNP = B-type natriuretic peptide; BUN = blood urea nitrogen; CRT = cardiac resynchronization therapy; EF = ejection fraction; GDMT = guideline-directed medical therapy; HF = heart failure; ICD = implantable cardioverter-defibrillator; LVEF = left ventricular ejection fraction; NT-proBNP = N-terminal pro–B-type natriuretic peptide; NYHA = New York Heart Association.