ACCEPTED MANUSCRIPT

Yancy, et. al. 2017 ACC/AHA/HFSA Heart Failure Focused Update

Table 1. Applying Class of Recommendation and Level of Evidence to Clinical Strategies, Interventions, Treatments, or Diagnostic Testing in Patient Care* (Updated August 2015)

CLASS (STRENGTH) OF RECOMMENDATION CLASS I (STRONG) **Benefit >>> Risk** Suggested phrases for writing recommendations: Is recommended Is indicated/useful/effective/beneficial Should be performed/administered/other ■ Comparative-Effectiveness Phrases†: • Treatment/strategy A is recommended/indicated in preference to treatment B • Treatment A should be chosen over treatment B Suggested phrases for writing recommendations: Is reasonable Can be useful/effective/beneficial Comparative-Effectiveness Phrases†: • Treatment/strategy A is probably recommended/indicated in preference to treatment B It is reasonable to choose treatment A over treatment B CLASS IIb (WEAK) Benefit ≥ Risk Suggested phrases for writing recommendations: May/might be reasonable May/might be considered Usefulness/effectiveness is unknown/unclear/uncertain or not well established **CLASS III: No Benefit (MODERATE)** Benefit = Risk Suggested phrases for writing recommendations: Is not recommended Is not indicated/useful/effective/beneficial Should not be performed/administered/other CLASS III: Harm (STRONG) Risk > Benefit Suggested phrases for writing recommendations: Potentially harmful

LEVEL (QUALITY) OF EVIDENCE

LEVEL A

- High-quality evidence‡ from more than 1 RCT
- Meta-analyses of high-quality RCTs
- One or more RCTs corroborated by high-quality registry studies

LEVEL B-R

(Randomized)

- Moderate-quality evidence‡ from 1 or more RCTs
- Meta-analyses of moderate-quality RCTs

LEVEL B-NR

(Nonrandomized)

- Moderate-quality evidence‡ from 1 or more well-designed, well-executed nonrandomized studies, observational studies, or registry studies
- Meta-analyses of such studies

LEVEL C-LD

(Limited Data)

- Randomized or nonrandomized observational or registry studies with limitations of design or execution
- Meta-analyses of such studies
- Physiological or mechanistic studies in human subjects

LEVEL C-EO

Expert Opinion

Consensus of expert opinion based on clinical experience

COR and LOE are determined independently (any COR may be paired with any LOE).

A recommendation with LOE C does not imply that the recommendation is weak. Many important clinical questions addressed in guidelines do not lend themselves to clinical trials. Although RCTs are unavailable, there may be a very clear clinical consensus that a particular test or therapy is useful or effective.

- * The outcome or result of the intervention should be specified (an improved clinical outcome or increased diagnostic accuracy or incremental prognostic information).
- † For comparative-effectiveness recommendations (COR I and IIa; LOE A and B only), studies that support the use of comparator verbs should involve direct comparisons of the treatments or strategies being evaluated.
- ‡ The method of assessing quality is evolving, including the application of standardized, widely used, and preferably validated evidence grading tools; and for systematic reviews, the incorporation of an Evidence Review Committee.

COR indicates Class of Recommendation; EO, expert opinion; LD, limited data; LOE, Level of Evidence; NR, nonrandomized; R, randomized; and RCT, randomized controlled trial.

Associated with excess morbidity/mortality

Should not be performed/administered/other

Causes harm