# ガイドラインに準じた心不全治療はどれだけの患者を救えるか

Congestive Heart Failure

**Potential impact of optimal implementation of evidence-based heart failure therapies on mortality**

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**Am Heart J 2011;161:1024-1030.**

UCLA cardiomyopathy centor

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患者の登録は，AHAの統計に元に行われた.

The number of patients with HF in the United States wasbased on data selected for the 2010 American Heart Association Heart Disease and Stroke Statistics Update *(Circulation 2010;121:e46-215.)*

患者が受けている治療については，下記の実態調査を元に上記の患者統計から算出された.

外来患者→IMPROVE HF *(Circ Heart Fail 2008;1:98-106.)*

入院患者→Get With The Guidelines-Heart Failure. *(J Am Coll Cardiol 2007;50:768-77.)*

各治療法における重要論文からNumber Need to Treatが引用され，それに基づいて，治療を行なっていれば防げたであろう死亡数が算出された

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アメリカ合衆国における心不全の有病者率　580万人/3億人(≒2%)

のうち HFrEFは45-48%，年間死亡者数は4.8%

**ホスピス，VAD導入，心移植待機中の患者は除外された

→2,784,000人が解析の対象

| Variable | IMPROVE HF (LVEF ≤35%) (n = 15177) | OPTIMIZE-HF (LVEF <40%) (n = 20188) | GWTG-HF (LVEF <40%) (n = 55083) |
|---|---|---|---|
| Age (y), mean | 68.7 | 70.4 | 68.6 |
| Female sex (%) | 29.0 | 38.0 | 36.1 |
| Hypertension (%) | 61.7 | 66.2 | 71.8 |
| PVD (%) | 11.3 | 13.7 | 11.5 |
| CAD (%) | 65.2 | 54.0 | 52.3 |
| CVA/TIA (%) | 11.8 | 13.7 | 13.3 |
| Depression | 9.0 | 9.2 | 8.2 |
| Diabetes (%) | 34.0 | 39.2 | 40.1 |
| COPD (%) | 16.5 | 24.8 | 22.2 |
| Creatinine, mg/dL (median) | 1.2 | 1.4 | 1.3 |

NYHA心機能分類　Ⅰ:30%, Ⅱ:40%, Ⅲ:25%, Ⅳ:5%

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## 2013 ACCF/AHA guideline

**禁忌がないかぎり，ACE阻害薬またはARBは全てのHFrEFに処方されるべきである.**

ACE inhibitors are recommended in patients with HFrEF and current or prior symptoms, unless contraindicated, to reduce morbidity and mortality. *(Class Ⅰ, Level of Evidence: A)*

ARBs are recommended in patients with HFrEF with current or prior symptoms who are ACE inhibitor intolerant, unless contraindicated, to reduce morbidity and mortality. *(Class Ⅰ, Level of Evidence: A)*

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## 2013 ACCF/AHA guideline

**禁忌がないかぎり，β遮断薬は全てのHFrEFに処方されるべきである.**

Use of 1 of the 3 beta blockers proven to reduce mortality (e.g., bisoprolol, carvedilol, and sustained-release metoprolol succinate) is recommended for all patients with current or prior symptoms of HFrEF, unless contraindicated, to reduce morbidity and mortality. *(Class Ⅰ, Level of Evidence: A)*

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## 2013 ACCF/AHA guideline

**禁忌がないかぎり，ACE阻害薬またはARBは全てのHFrEFに処方されるべきである.**

Aldosterone receptor antagonists (or mineralocorticoid receptor antagonists) are recommended in patients with NYHA class II–IV HF and who have LVEF of 35% or less, unless contraindicated, to reduce morbidity and mortality. Patients with NYHA class II HF should have a history of prior cardiovascular hospitalization or elevated plasma natriuretic peptide levels to be considered for aldosterone receptor antagonists *(Class Ⅰ, Level of Evidence: A)*

Aldosterone receptor antagonists are recommended to reduce morbidity and mortality following an acute MI in patients who have LVEF of 40% or less who develop symptoms of HF or who have a history of diabetes mellitus, unless contraindicated. *(Class Ⅰ, Level of Evidence: B)*