University Cincinnati Medical Center

Best Practice: The Journey to an Advanced Heart Failure Program

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Objectives

• Explain/describe what defines readmission for heart failure.
• Distinguish two challenges and highlight two benefits of working with AHA’s Get With The Guideline Program seeking accreditation for Advanced Heart Failure and improving patient care.

Benefits of AHA Awards and Accreditation

• Highlight to the community & payers the use of evidence based practices
• Quality of patient care is improved through a systematic approach
• Demonstrates a commitment to higher standards of service
• Provides a framework for organizational structure and management
• Provides a competitive edge in the marketplace
• Enhances staff recruitment and development
What Is Heart Failure?

Heart Failure = Circulatory Failure

Heart failure is a result of myocardial muscle dysfunction resulting in an inadequate blood supply to vital organs. Sympathetic stimulation and renin-angiotensin-aldosterone activation ensue, leading to further deleterious LV remodeling, increased \( \text{MVO}_2 \), and Na and water retention. Decreased perfusion to skeletal muscles, GI tract and splanchnic beds occurs which presents as lung and liver congestion, fatigue, renal insufficiency, edema and dyspnea--to name a few symptoms.

Heart Failure Epidemiology

- Currently, 5.7M Americans have HF
- 870K new cases diagnosed annually
- Prevalence will increase 46% from 2012-2013 resulting in >8M with HF
- Death rate in HF remains high: ~50% perish within 5 years of diagnosis
- 75% of cases have antecedent Hypertension
Utilization and Costs

- Current total HF costs are $30.7B
- Projections for 2030 are an increase of 127% meaning costs increase to $69.7B
- In 2010, there were 1.008M discharges and by 2010, 1.023M
- 2010: 1.801M office visits, 676K ED visits and 236K out patient dept. visits

2010

- CMS announces its intention to begin penalties for readmissions for major chronic diseases
Penalties by CMS for Heart Failure 30 day Readmissions

• Readmission for any cause within 30 days of discharge among patients with a primary diagnosis of heart failure (HF)

• Affordable Care Act, Medicare began financially penalizing hospitals with higher-than-average 30 day readmission rates.

• Bonuses are given to hospitals with lower than average 30 day readmission rates

Estimates of Cost of Readmission

• Medicare: 18 billion spent on 30 day rehospitalizations annually
  • 1 out of every 5 Medicare patients discharged from a hospital is readmitted within 30 days (CMS)
  • HF is ranked as the #1 chronic condition for 30 day readmissions
• 30 Day All Cause HF readmission rates range 17.3%-24.7%
• Readmissions are frequent, costly and can be reduced

IHI, 2010
Joining a National Effort to Improve the Quality of Heart Failure Healthcare

- In October 2010, UCMC joined more than 100 other forward-thinking hospitals through the Robert Woods Johnson Initiative. Together, 16 communities identified ways to improve the quality of patient care provided to heart failure patients.
- Nationally, 98% of hospital teams participating in (RWJ) Aligning Forces for Quality improved the quality of care for their patients in measurable ways.

Starting the Advanced Heart Failure Program

Formed a Multidisciplinary Team:
- Nurse managers including CNO
- CCU, CSD and Telemetry
- Nurse educators, floor RN’s, HF Office RNs and NPs
- Social workers, Pharmacy Director, Discharge Planners/Utilization Review, Statistical Support (MIDAS)
- Chief Residents
- Medical Director
First Task

• Acknowledge every one’s frustration with “revolving door” phenomenon of heart failure patients and lack of understanding of chronic Heart Failure
• Contrast the difference between Acute MI and ADHF: AMI-acute process with clearly defined therapies based on successful clinical trials vs. **NO** successful ADHF trials
• Types of HF: HCM, RCM, DCM, systolic vs. diastolic dysfunction; various etiologies of DCM

Second Task

• Very important for the “do-ers” to have support of administration
• Review statistics that we already had LOS
  Readmission rate
We found that we had a short LOS (3.6 days) and a bimodal readmission pattern: DC day 4 and 14
Your Heart’s Connection Program

Mission
To offer patients the education and resources to properly manage and treat congestive heart failure.

Goal
To implement a disease management program to provide a comprehensive education and resource liaison to support and empower CHF patients. The program is designed with a primary focus of reducing hospital re-admissions.

Your Heart’s Connection Program

- After admission, the care team places a referral to Your Heart’s Connection. We placed a consult order that could be checked for this team in the admission order set.
- The nurse and/or heart failure coordinator initiates the education process and gives the patient an education packet.
  - Education packet focuses on diet, fluid restriction, daily weights, activity, and worsening heart failure symptoms
  - All in-patients are encouraged to attend a 60 minute heart failure education class
  - The patient is screened for barriers and consults are ordered as needed: social work and financial counseling for all patients
- If needed, patients are provided a scale, medication organizer, measuring cup and calendar for daily weights
Third Task: Goals

- We decided on multiple goals
- Decrease readmission rate by a realistic amount of 2%. Our initial readmission rate was 28%.
- To join the AHA’s GWTG HF program and WIN AWARDS!!
- Educate providers and patients

Implementation
1. Multidisciplinary team met every 2 wks
2. Your Heart’s Connection Team
3. Created admission and discharge order sets that included basics: 2 gm sodium diet and 1500 ml fluid restriction, daily weights
4. Nursing care pathway
5. Increased meds at DC from 5 to 14 day supply for indigent pts or those without PCP’s
Implementation

6. “Fluid restriction” magnetic sign
7. “Teach back” method implemented
8. Gave all cardiac patients an education binder regarding their particular disease state, likely medicines, suggested diets and exercise regimens.

Implementation

9. Mandated standing daily weights on all patients/all units if at all possible to stand
10. Created 1 Nurse Coordinator position to start
11. Partnered with 3 area HH companies and had HHRNs shadow us in HF clinic and presented them 4 hrs didactics
12. Worked with Pharmacy re: discharging pts with IV Lasix dose
Implementation

13. In-patient education classes: 1 hr twice weekly

14. Out-patient education classes: 1 hr sessions once monthly. Diploma awarded to those that attend all 4 classes

• Rolled out all the above in April, 2011. This was ~6 months after our first multidisciplinary meeting
Awards

• AHA Get With The Guidelines
  Bronze Award 2012
  Silver Award 2013
  Gold Plus Award 2014
  Gold Plus Award with Honor Roll
  2015 and 2016

One of Two Hospitals in State of Ohio
**UCMC: Road to Accreditation**

- Get with the Guidelines- Heart Failure
- 2 APN HF coordinator positions created and qualified personnel hired
- Established clinical practice guidelines

**Clinical Practice Guidelines**

Comprehensive Guidelines Developed by the Multidisciplinary Heart Failure Team Based on Current National Guidelines

- Diagnostic Testing
- Assessment
- Nursing Care
- Medical Management
- Treatments & Interventions
- Recognition of Barriers
- Consults

(Based on the ACC/AHA, HESA, & ESC guidelines)
UCMC: Road to Accreditation (con’t)

- HF pathway & discharge checklist updated
- After-hospital care plan developed & implemented
- *Your Hearts Connection* education folder given to patient when able to participate in education process.
  - Calendar, mediset, measuring cup, scale
- Discharge weights documented on transition of care form.
  Forms faxed at discharge to the next level of care: personal provider, nursing home, Home Care etc.

Discharge Planning

- Follow-up appointments arranged within 7 days of discharge
- Advocate for discharge home with home health or to nursing home
- Free two week supply of discharge medications given to indigent patients
- Patient evaluated prior to discharge using teach back method on knowledge of HF self-care
- Patients contacted within 72 hours of discharge and encouraged to use the *Your Hearts Connection* phone line for questions
- Patients questioned regarding education, preparedness, & overall satisfaction with hospital experience.
Phase II Initiatives: Focusing on Quality

- Implementation of EPIC system wide
  - Order sets: admission & discharge, homecare & SNF
  - Core measure navigator
  - Education documentation
  - Follow-up appointments

- Collaboration with ancillary staff
  - Social work, dietary, PT/OT, cardiac rehab, palliative care, chaplains, etc.
Phase II Initiatives:  
Focusing on Quality

- New education materials for patients
  - Cardiology handbooks
  - Patient driven, daily medication information sheet
  - Your Hearts Connection bracelets
- Continuous education to staff
  - Nursing
  - Physicians & residents
  - ED observation unit
  - Coders

Education: Healthcare Providers

- RN Orientation Skills Checklist
- Initial Training and Competence
- Critical Care Internship Program
- Bi-Annual Competency (Spring/Fall)
- Yearly Staff Skills Checklist
- Demonstration Skills Lab
- Individualized Teaching
- Resource Manuals
- Morbidity and Mortality Panel
- Patient Safety Crucial Conversation Meetings
- Interim updates provided by Heart Failure Coordinator and/or staff educator
- Grand Rounds/Nursing Grand Rounds
- Access to Internet, computer based training, device manuals, training CDs, and reference cards
- Dinner for Spotlight on Heart Failure
- Monthly in-services for residents
Phase II Initiatives: Focusing on Quality

- IMPACT Committee
- Transition of Care meetings
- Focus group for literacy & health literacy
- Continued growth of mechanical circulatory support and cardiac transplant programs
- Ultrafiltration program for in and outpatients

Phase II Initiatives: Focusing on Quality

- Partnerships with outside agencies
  - Education to skilled nursing facilities
  - Homecare Agencies & Rehab Facilities
    - Invitations to nursing competencies
    - Lecture provided by HF nurse practitioners
    - Individualized training in HF clinic
  - Palliative Care & Hospice
    - Early introduction and education
    - More family meetings
    - Home inotrope therapy
Community Outreach

- Heart Failure classes for inpatients and monthly classes for outpatients
- Greater Cincinnati Urban League Health Fair
- American Heart Association Mini-Marathon
- American Heart Association’s Go Red For Women Event
- Annual Center for Closing the Health Gap Conference & Health Expo
- Deaf and Hard of Hearing Community Health Fair
- Heart Month & HF Clinic Open House
- Meeting with congressman to discuss healthcare legislation
- Su Casa Health Fair
- UC Campus Wellness Health Fair
- Walk with a Doc
- Women 4 Women
- Breathe Heart Failure and Cardiovascular Symposium
- Cardiovascular Disease for Primary Care and Specialist
- EMS Midwest Conference
- Greater Cincinnati Health Council
- Advanced Heart Failure & LVAD Case Study Presentation

Barriers

- Transportation Issues
  - To physician visits, dialysis, pharmacies, rehabilitation sessions & out-patient testing
- Lack of primary care providers
- Literacy Issues: health literacy & illiteracy
- Monetary issues regarding healthy foods and lack of inner city grocery stores
- High sodium American diet (3-4 gram)
Awards & Recognition

- **The Joint Commission** Advanced Certification in Heart Failure Treatment (Completed September 2015 onsite survey with no findings)
- **American Heart Association** Get with the Guidelines Heart Failure Gold Plus Award and Honor Roll (1 of 2 hospital in Ohio)

Heart Failure Readmission Rates per Fiscal Year
Thank You!