

Heart Failure (HF) Network of VA Providers:

An Innovative Strategy for Implementation

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Conflict of Interest: NONE

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Purpose

To describe our experience with the formation and use of a Community of Practice (CoP) of VA providers as a strategy to improve care for heart failure patients.

Background

- Heart failure (HF) is associated with high mortality and poor quality of life.
- Moreover, it is the most common medical reason for admission within and outside of the VA health care system.
- Reducing admission and readmission rates for HF are goals of CHF QUERI, VA in general and non-VA partner organizations like the Institute for Healthcare Improvement.

About Social Networks

- There is growing interest in the use of social networks to facilitate knowledge exchange in health-care settings.
- Creating connectedness among providers using EBP in the treatment of specific disease may foster exchange of best practices.
- Social network structures provide opportunities for members to connect and share information.

Social Network: Examples

- **Condition-specific networks** have been formed among providers with similar clinical interests.
- In British Columbia, a heart failure provider network has been created among cardiologists, internists, family physicians, nurses, pharmacists, dieticians and social workers.
- A network for New York providers treating patients with tuberculosis was associated with a 10-fold increase in the number of individuals receiving directly observed therapy (Klein, 1995).
- Montreal Stroke Network

Communities of Practice (CoPs)

- CoPs are a type of informal learning organization.
- They are gaining popularity in the health sector.
- CoPs have 3 fundamental elements:
 - i. a domain of knowledge
 - ii. a community of people
 - iii. a shared practice
- Wenger (2002) has described CoPs as “groups of people who share a concern, a set of problems, or a passion about a topic, and who deepen their knowledge and expertise in this area by interacting on an ongoing basis”.

Building CoPs through Social Network: Examples

- There is growing evidence of CoPs being developed as social networks.
- Norman and Huerta (2006) have examined building foundations for a CoP using evaluation and social network methodologies.
- Poissant (2005) reported that emergent CoPs with the Montreal Stroke Network were successful in developing and implementing critical inputs, such as referral tools that accelerated patients' transition between acute care to rehab.

Conceptual Frameworks for Implementation

- We have conceptualized the HF Network as a CoP
- We have used 2 complementary theoretical frameworks for implementation:
 - ❖ **The Promoting Action on Research Implementation in Health Services (PARIHS)** framework (2008) according to which successful implementation is a function of evidence, context and facilitation.
 - ❖ **Rogers' Diffusion of Innovation Theory** (2003) indicates that opinion leaders play a critical role in shepherding an innovation.

About the HF Network

- CHF QUERI has formed a CoP called:
Heart Failure (HF) Network
- It is a national network of VA providers interested in improving quality of care for heart failure patients.
- It is supported by:
 - The Office of Patient Care Services, and
 - Dr. John Rumsfeld, Director National Cardiology Program

Goals of HF Network

1. Share evidence-based HF programs and facilitate their implementation
2. Understand the context (e.g. culture, leadership style, resources) at facilities.
3. Learn about barriers and facilitators to improving HF care
4. Establish collaborations/networking among members of the HF Network
5. Provide opportunities to identify/involve local champions at facilities

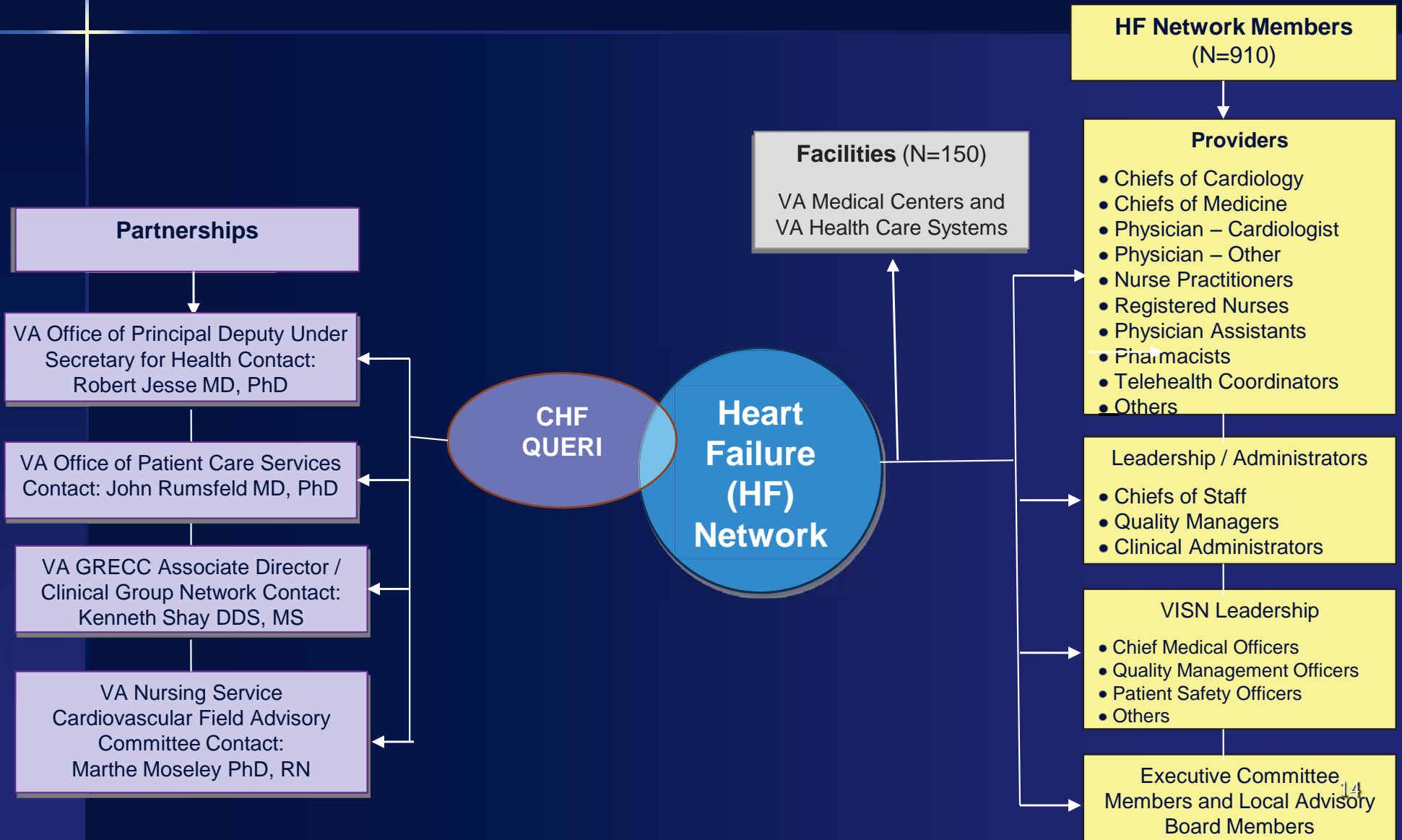
Formation of HF Network

- HF Network was formed in **July 2006**
- Chiefs of Cardiology or Chiefs of Medicine at each VA facility were contacted via e-mail and/or phone to identify providers interested in heart failure and quality of care.
- Identified providers were invited to join and were asked to identify any additional staff.
- Multi-disciplinary/multi-level membership.
- Members do not have to be providers (QI managers)

Formation of HF Network (contd.)

- Goal to include providers/staff from ALL VA Health Care Systems.
- Members can drop out by sending an email
- 1st session (in-person annual meeting) was held on **September 11, 2006 in Seattle.**

Connectedness of HF Network with VA Stakeholders



How Does HF Network Work?

- Conduct bi-monthly live meetings* and an annual in-person meeting* at a major HF conference.
- Communicate via:
 - E-mails
 - Conference calls
 - CHF QUERI / HF Network website
 - SharePoint site
 - Periodic surveys*

* Referred as "session" of the HF Network

Active Participation in the HF Network

- **“ACTIVE”** membership is defined as participation in at least one of the following activities:
 - Attend bi-monthly live meeting and/or conference call
 - Attend annual in-person meeting at a major HF conference (Heart Failure Society of America)
 - Complete a survey
 - Submit “Letter of Intent” to CHF QUERI for QUERI’s RRP or SDP proposals, or for CHF QUERI’s core funds

Current Membership

- 910+ members
- 150 facilities
- 1-13 members at each facility
- 1- 6 years of membership (from July 2006 onwards)

Activities

- Bi-monthly live meetings/conference calls
- HF programs
- Toolkits
- Tools
- SharePoint site as a discussion forum
- VA HF Experts
- Research projects
- Quality improvement (QI) projects
- Solicitation for QUERI proposals
- Surveys

Activities:

Bi-monthly live meetings/conference calls

As of 2012

- 7 Annual meetings and conference calls.
- 28 Bi-monthly live meetings/conference calls.

Plan for bi-monthly meetings:

- Announcements
- Updates
- Presentations with focus on barriers and facilitators followed by discussion by members from different facilities for following projects:
 - a) Funded research project
 - b) Quality improvement project at own facility

Activities:

Bi-monthly live meetings/conference calls (contd.)

Website: <http://www.queri.research.va.gov/chf/networks/schedule.cfm>
Screenshot of webpage is below

The screenshot shows a web browser window displaying the QUERI Chronic Heart Failure website. The page title is "Heart Failure Provider Network: Schedule". The main content area features a table titled "Schedule of Sessions:" with three columns: "Session Format", "Time/Place", and "Presentation Slides". The table lists four sessions, including a 1st Annual HF Network Meeting in September 2006 and three live meetings in November 2006, March 2007, and May 2007. The presentation slides for the live meetings include "Heart Failure Network (Heidenreich)", "VA Heart Failure Network (Heidenreich)", "A Comprehensive HF Program from Portland VA (Larsen)", "VA Heart Failure Network (Heidenreich)", "Assessment of Implantable Monitoring Devices for HF Patients (Massie)", and "National Heart Failure Training for Improved HF Care: N-HeFT (Pina)".

Session Format	Time/Place	Presentation Slides
1st Annual HF Network Meeting (in-person) / Conference Call	September 9, 2006 (Seattle, WA)	None
Live Meeting / Conference Call	November 6, 2006	Heart Failure Network (Heidenreich)
Live Meeting / Conference Call	March 2, 2007	VA Heart Failure Network (Heidenreich) A Comprehensive HF Program from Portland VA (Larsen)
Live Meeting / Conference Call	May 1, 2007	VA Heart Failure Network (Heidenreich) Assessment of Implantable Monitoring Devices for HF Patients (Massie) National Heart Failure Training for Improved HF Care: N-HeFT (Pina)

Activities:

SharePoint site

- CHF QUERI has a SharePoint on the intranet.
- All members are provided immediate access to it.
- Members may:
 - Discuss current topics related to the improvement of care for HF patients
 - Share/exchange new ideas, news & documents
 - Provide comments and feedback
 - Keep updated on conference calls and other important announcements
- Minimal traffic / SharePoint not really useful.

Activities:

Tools

CHF QUERI has various tools for:

- HF NURSES: “Heart Failure Nurse Education” conference was co-organized by CHF QUERI and Dr. Mike Pham from the Palo Alto VA
 - Website: http://www.queri.research.va.gov/chf/products/nurse_education/default.cfm
- HF PATIENTS:
 - HF Assessment Tool for self-management to track their health condition.
 - Patient education materials
 - Caregiver education materials

Activities:

Quality Improvement (QI) Project - "Heart Failure (HF) Provider Toolkit"

- We have developed a comprehensive evidence-based (EB) **"HF Toolkit for Providers"**
- Funding: CHF QUERI core funds
- Goal: To provide EB comprehensive tools to VA providers to better manage their HF patients.
- Toolkit materials are available through web-links and downloadable PDF documents.

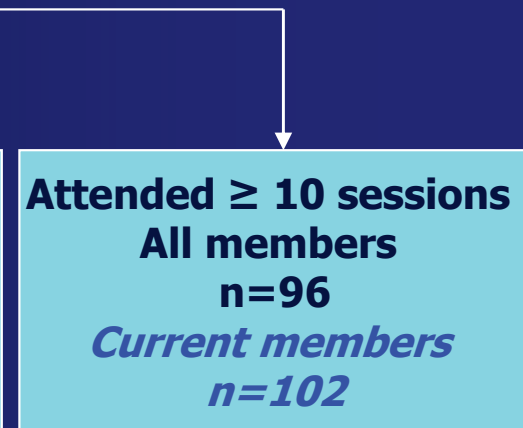
Activities:

QI Project - "Heart Failure (HF) Provider Toolkit" (contd.)

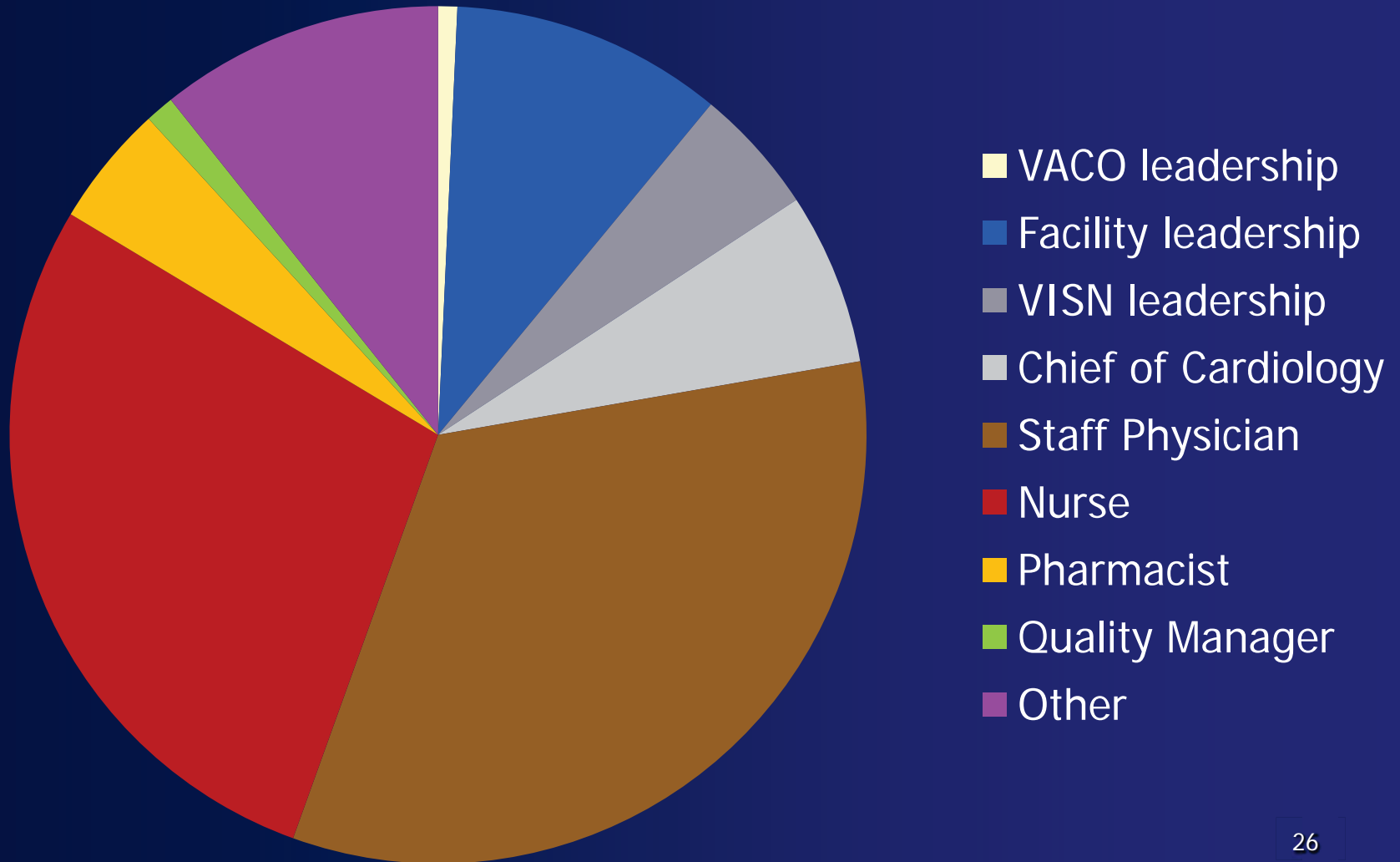
Method:

- HF Network members were asked to share their existing tools
- We reviewed existing quality tools being used/ recommended by non-VA HF organizations like AHA-GWTG & HFSA.
- A multidisciplinary committee of VA clinicians, nurses, pharmacists and a HF patient reviewed, screened and rated these tools.
- Selected tools are organized into 18 key areas.

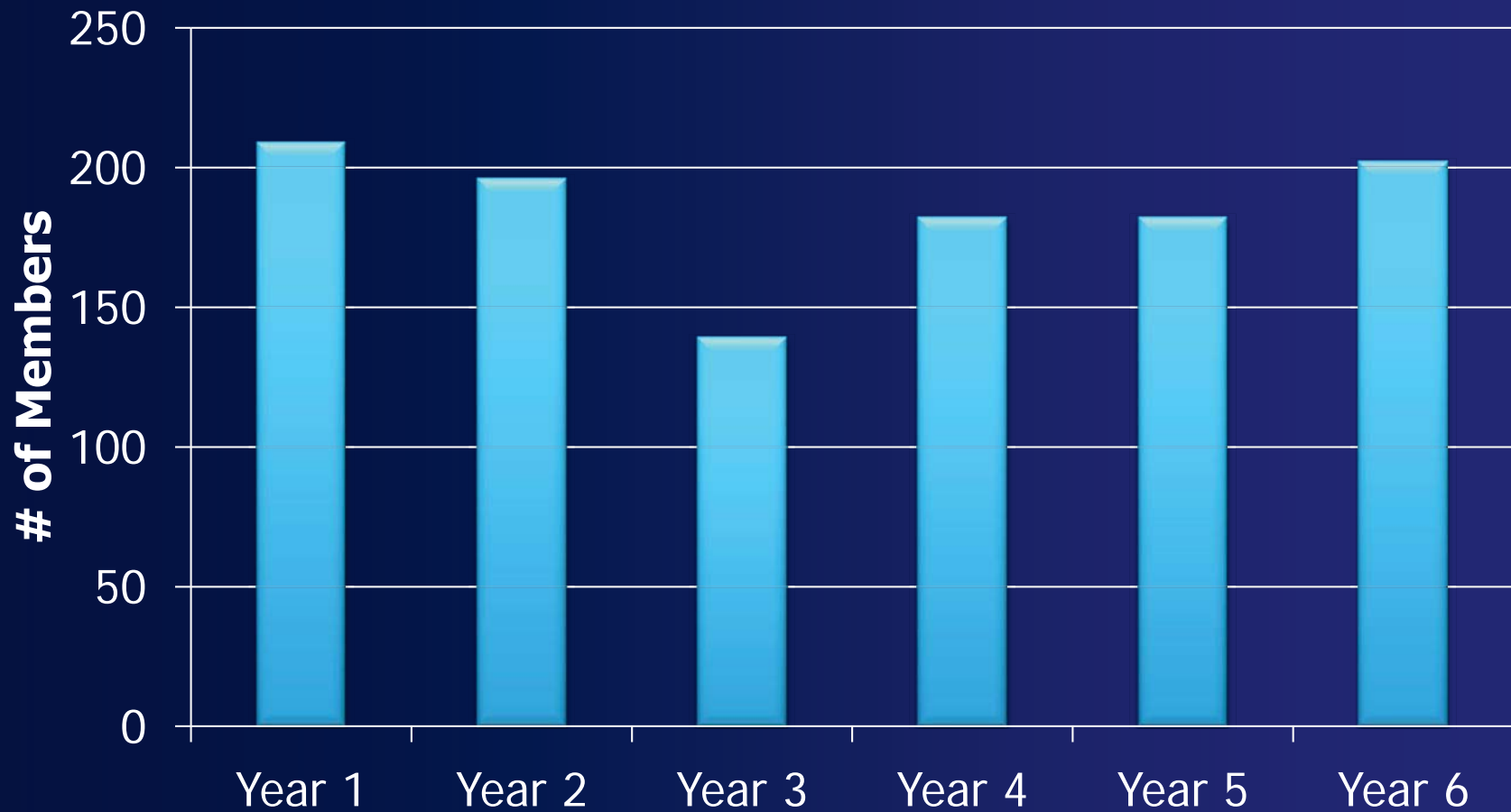
All and Current HF Network Members



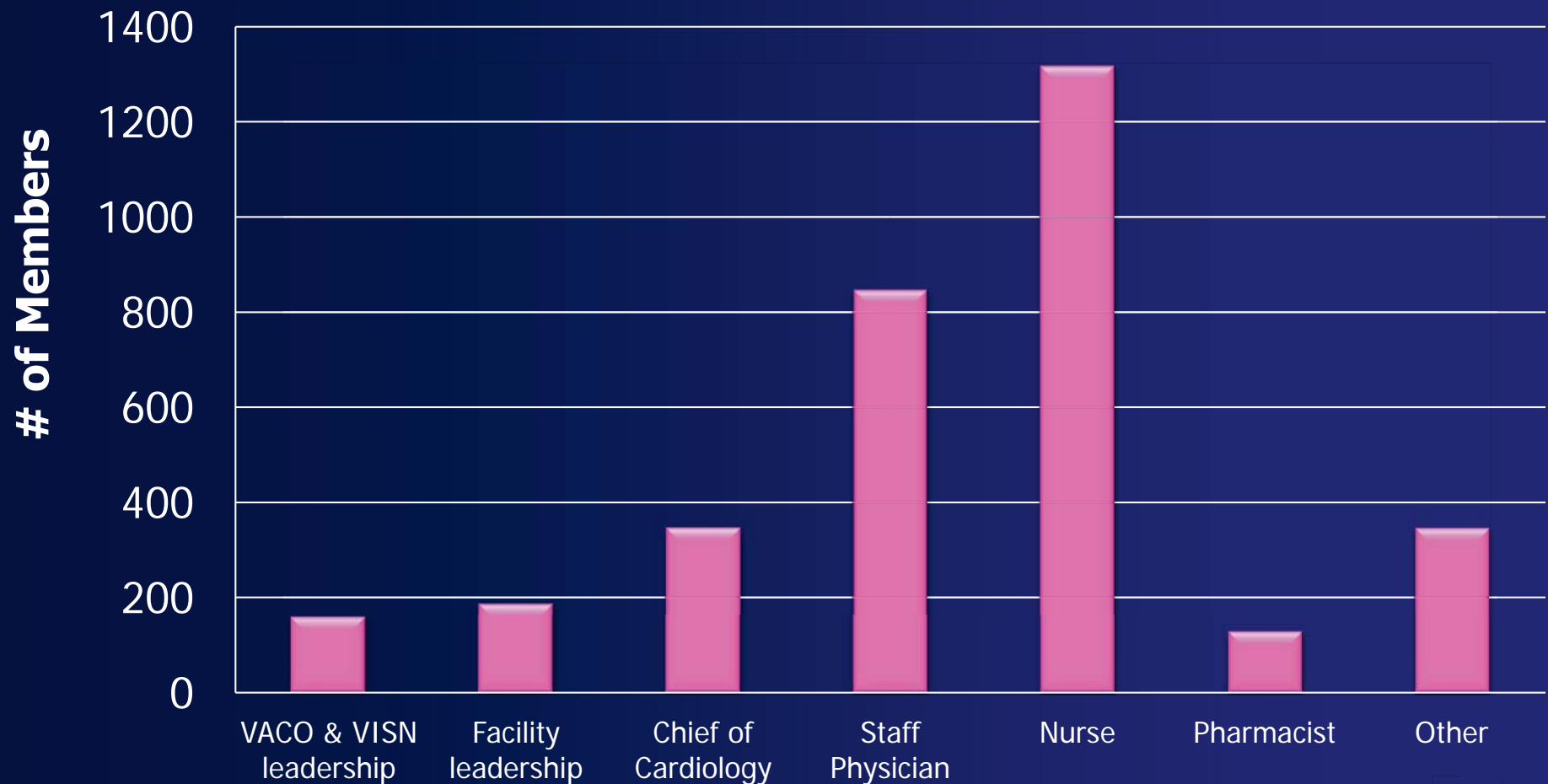
Types of Members



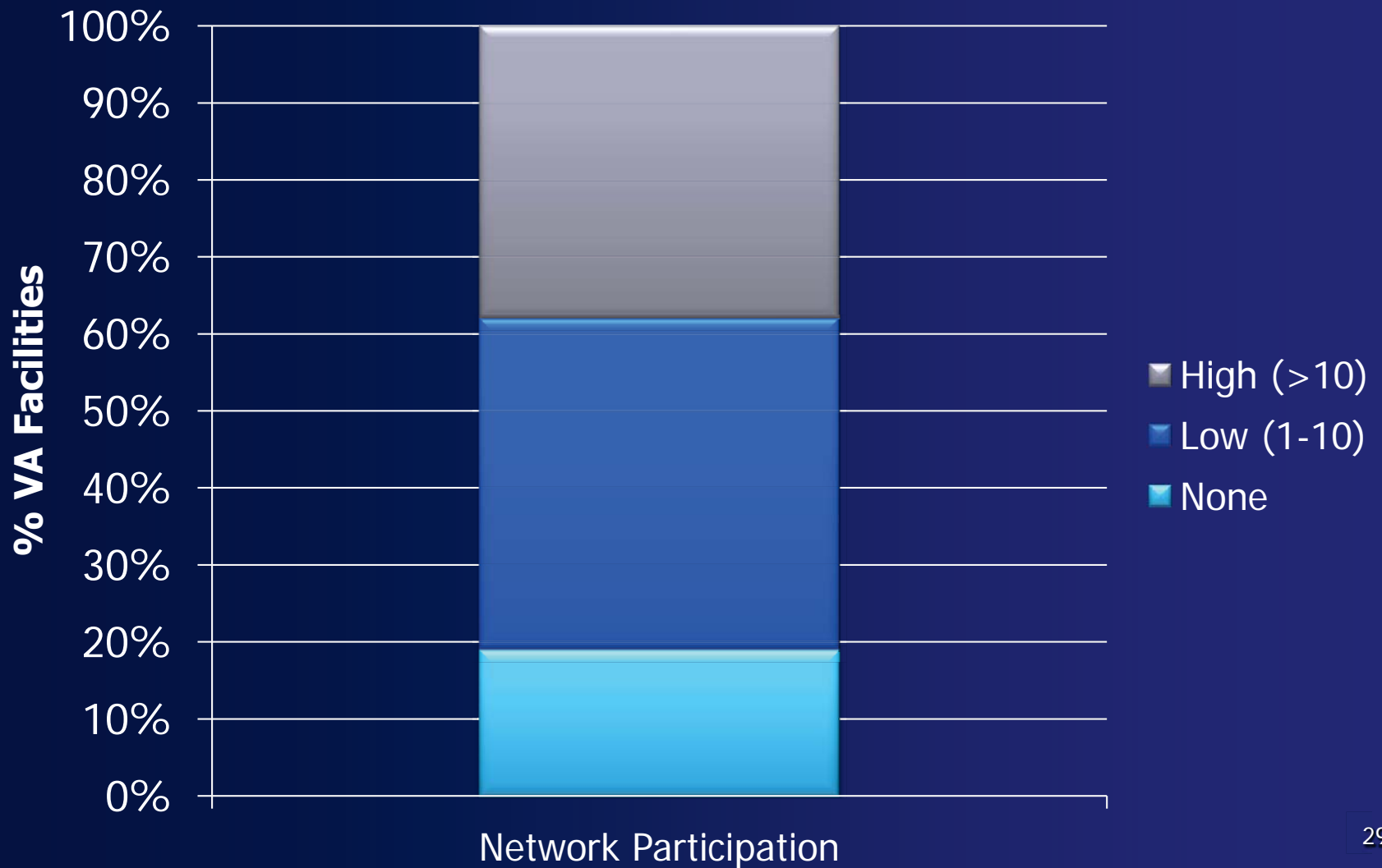
New Members Joining HF Network in Years 1-6



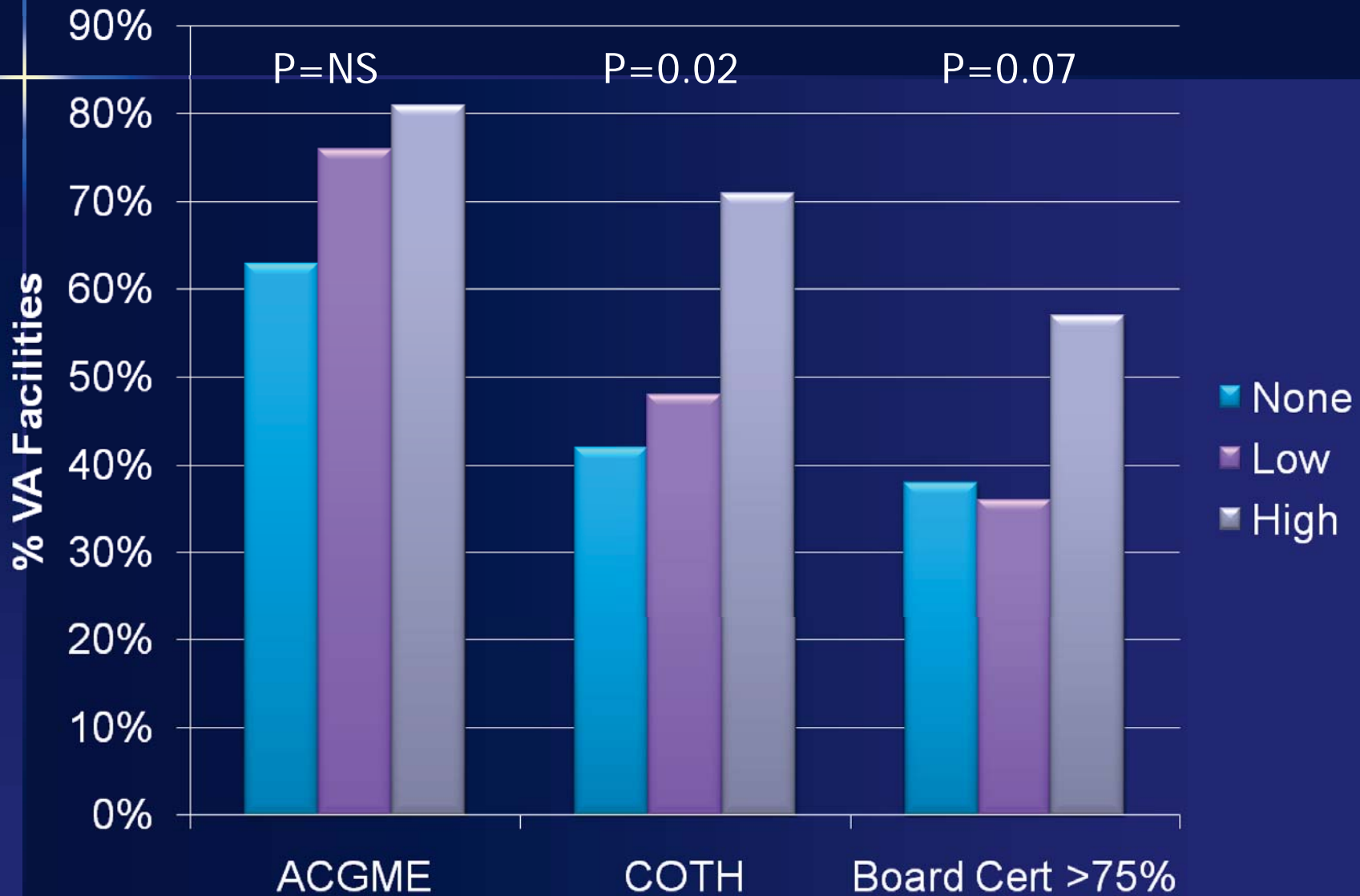
Total Participation in HF Network by Types of Members in Years 1-6



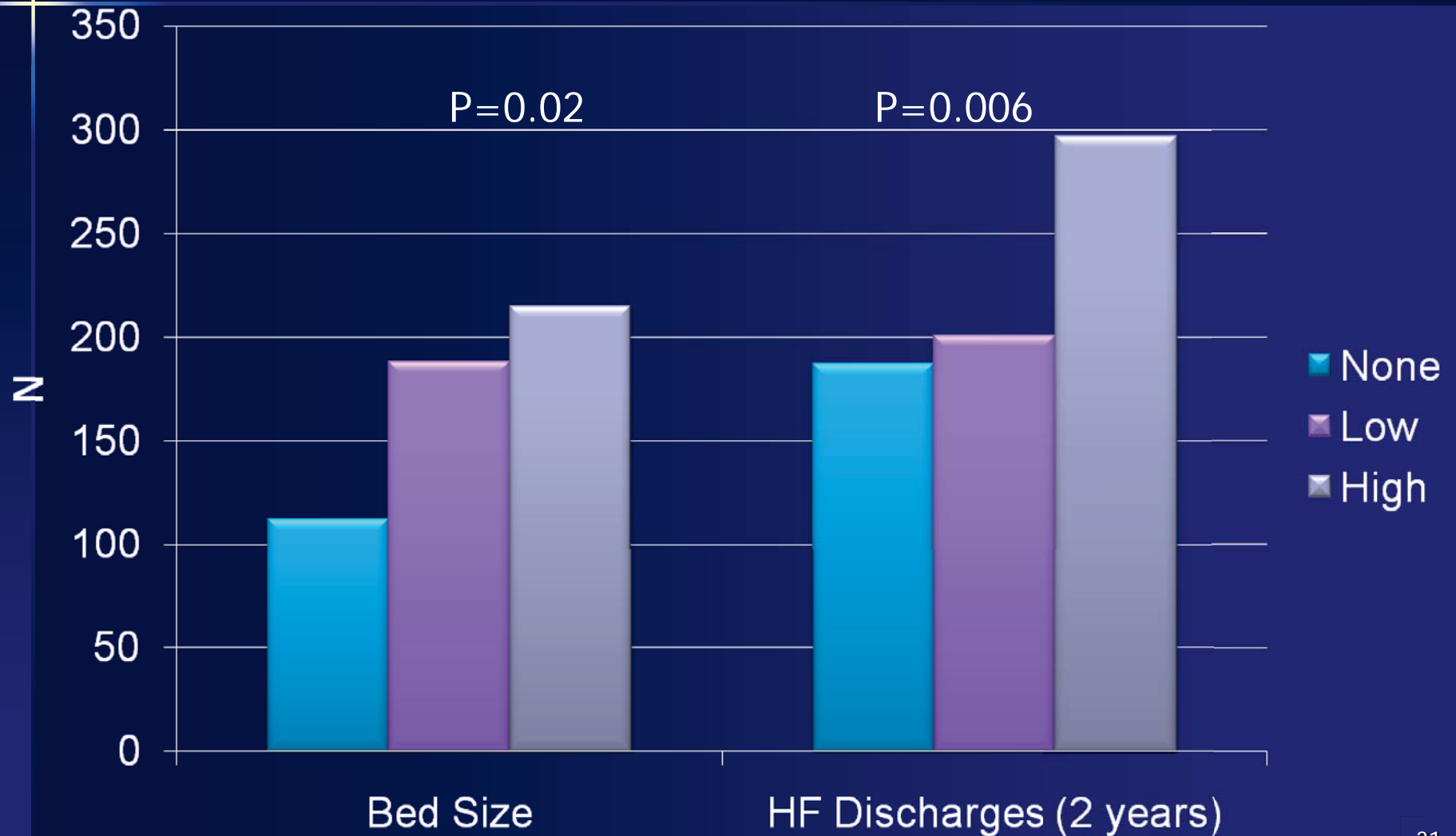
HF Network Participation By Facility



HF Network Participation and Academic Characteristics



HF Network Participation and Volume



Is the HF Network Effective?

- Formative evaluation of the HF Network is important to assess its value and make appropriate refinements in the implementation strategy.
- We have adopted a “phased” approach for the formative evaluation of the HF Network
- **PHASE 1 is complete using mixed methods:**
 - Survey: 115 members completed a web-based survey (32% response rate)
 - Interview: 17 members participated in semi-structured phone interviews with question-specific content analysis

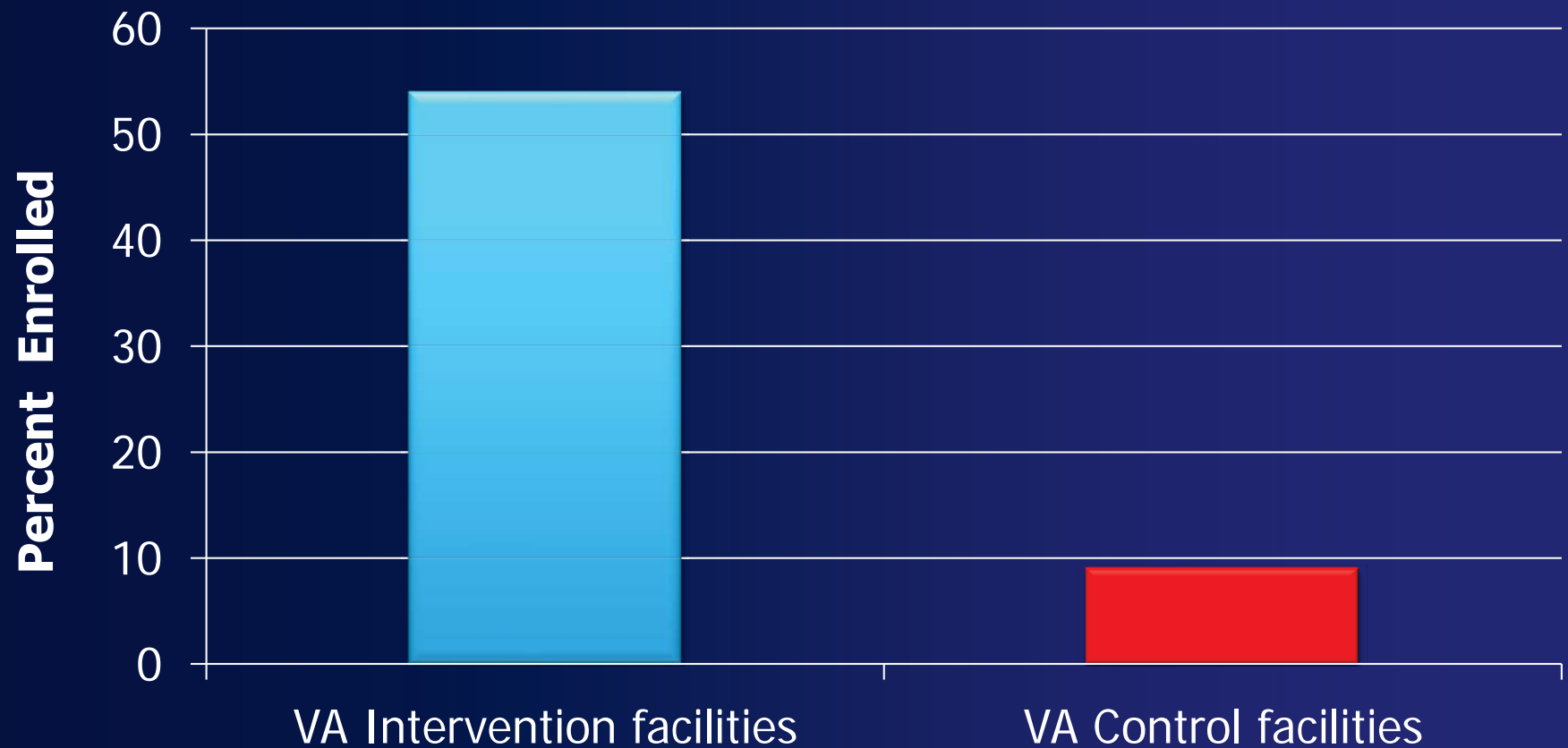
Is the HF Network Effective?

Research Project - VA H2H Initiative

- Conducted a **randomized trial** titled **“Implementation of the Hospital to Home (H2H) Heart failure Initiative”**
- Funding: QUERI SDP: 09-160
- Goal: 1. Enroll VA facilities on H2H website
2. Initiate projects to reduce HF readmission
- Method: i) Identified 122 facilities with 100+ HF discharges over 2 years
ii) Randomized 1:1 to usual care of HF Network activation

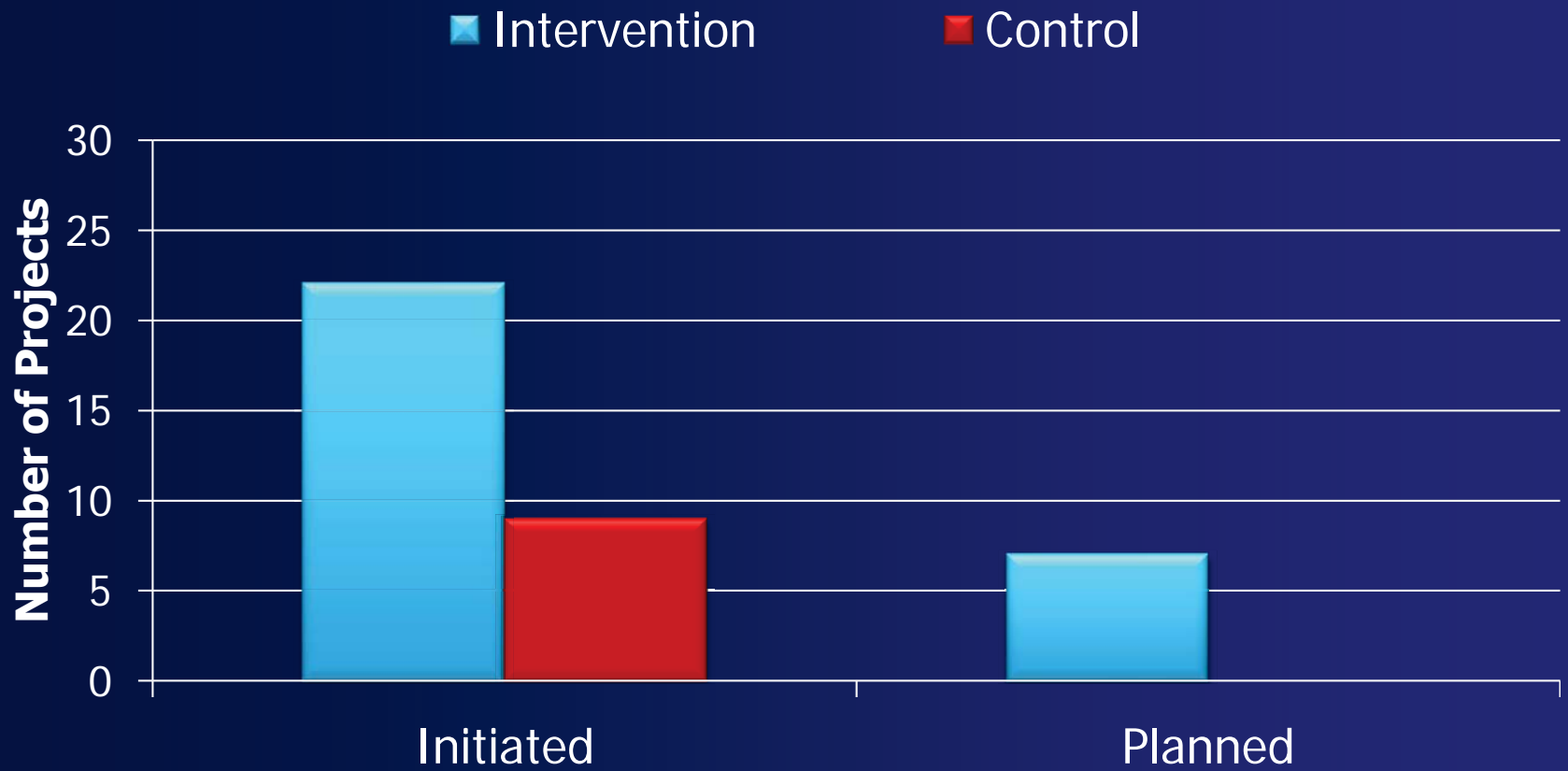
Using the HF Network to Implement a National Quality Initiative (H2H)

H2H Enrollment at Six months



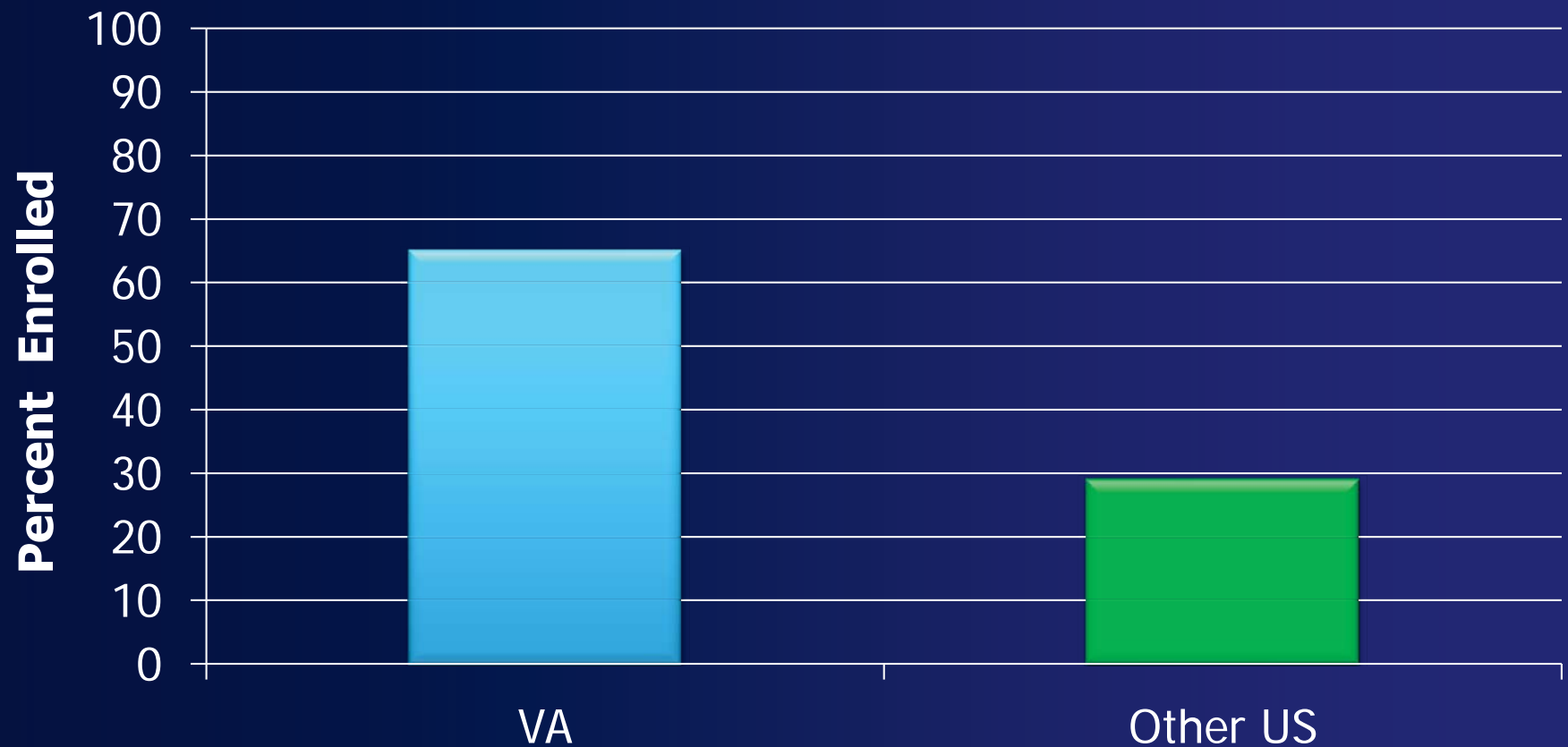
Using the HF Network to Implement a National Quality Initiative (H2H)

New Projects Due to VA H2H Initiative

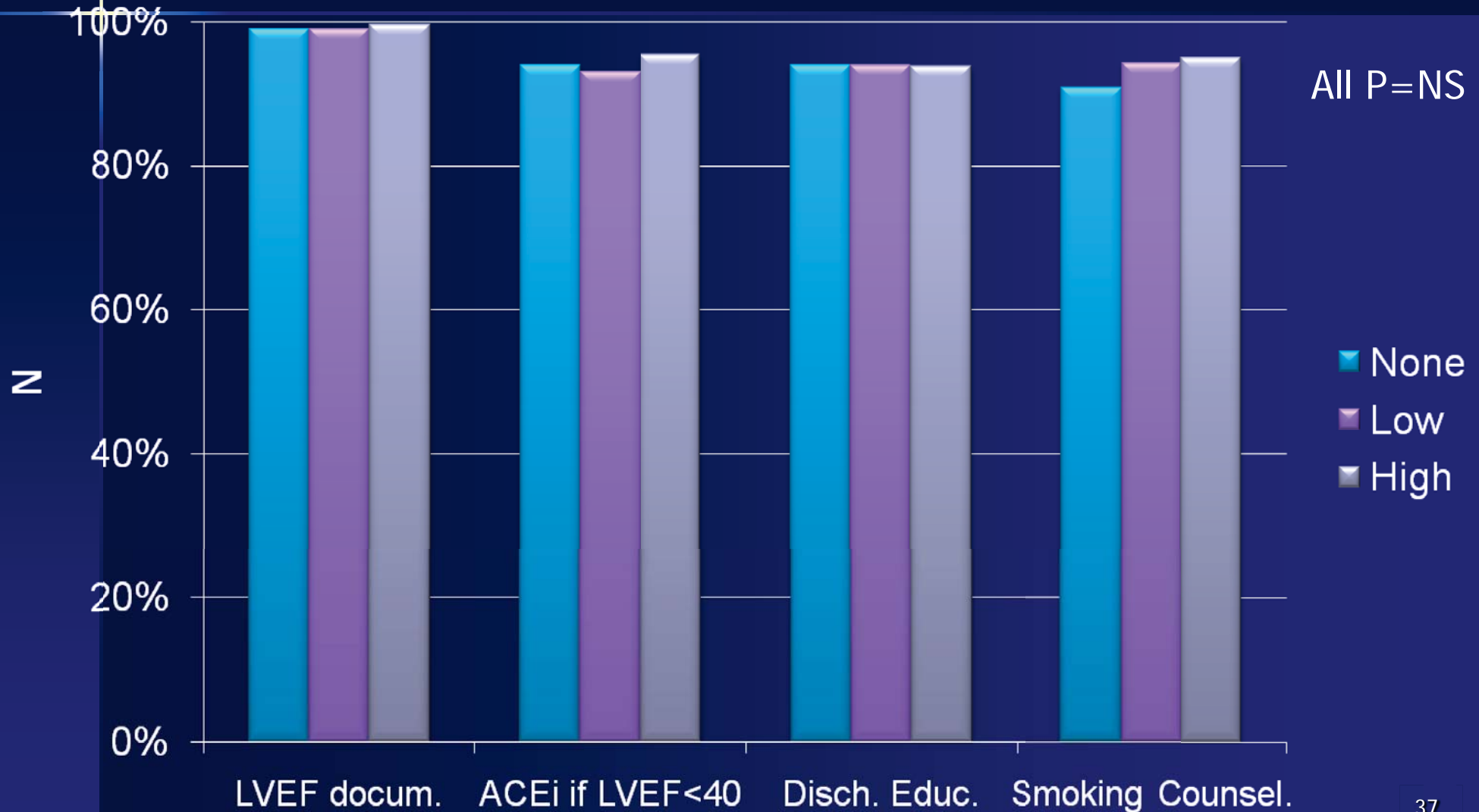


Using the HF Network to Implement a National Quality Initiative (H2H)

Facility Enrollment in H2H: 2012

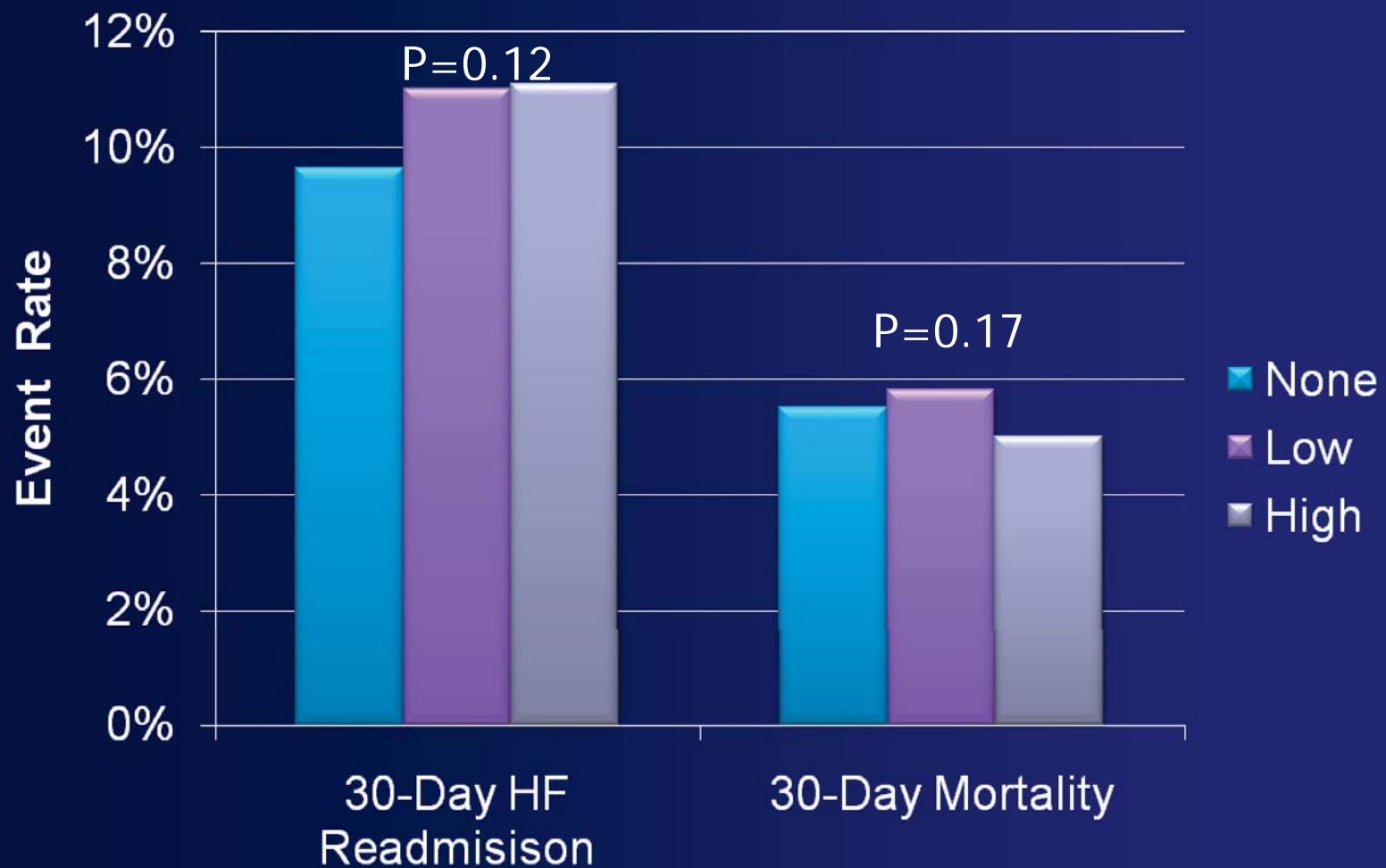


HF Network Participation and Quality of Care



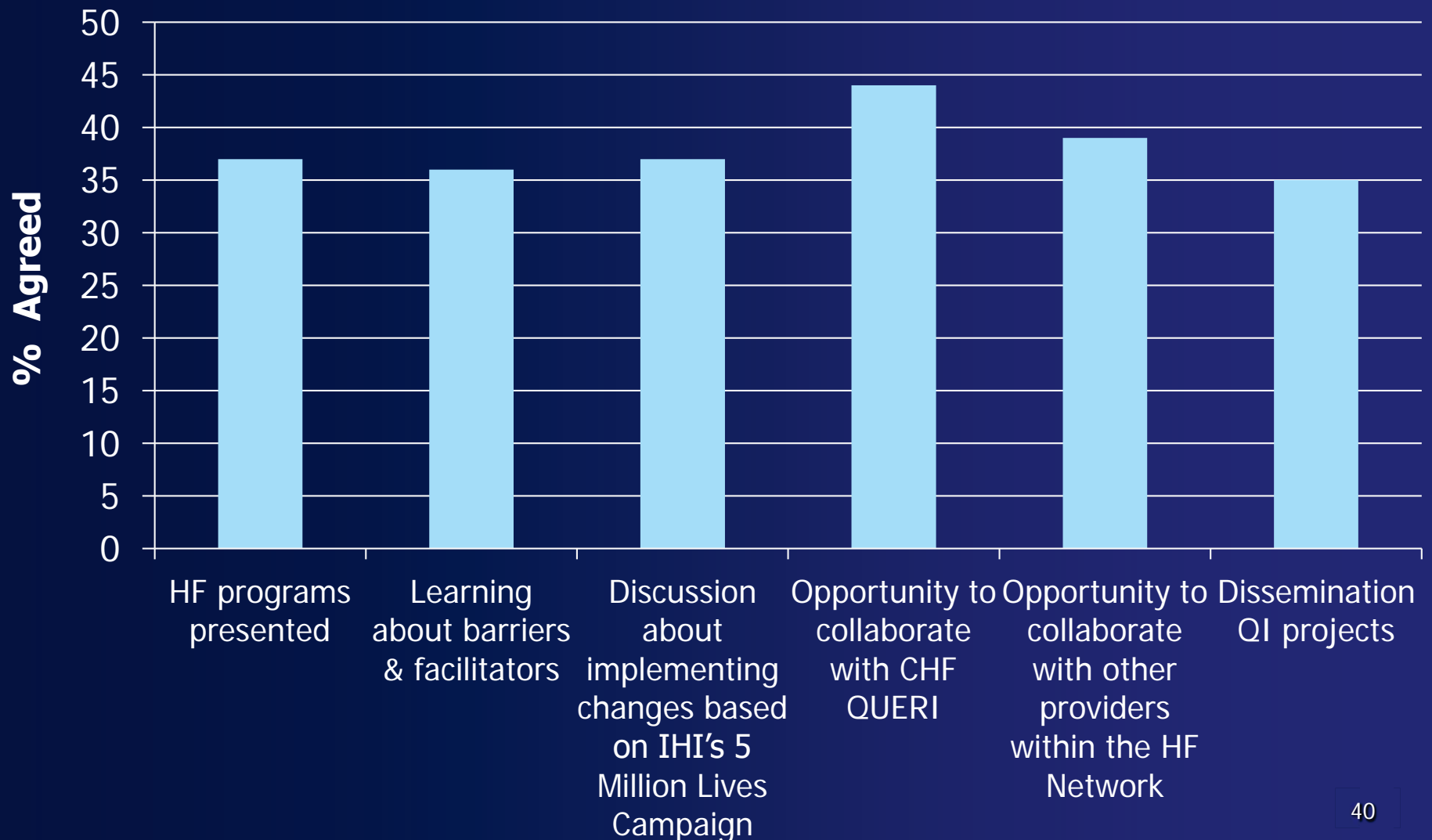
CMS and Joint Commission Inpatient Performance Measure

HF Network Participation and 30-Day Outcome Following a HF Discharge

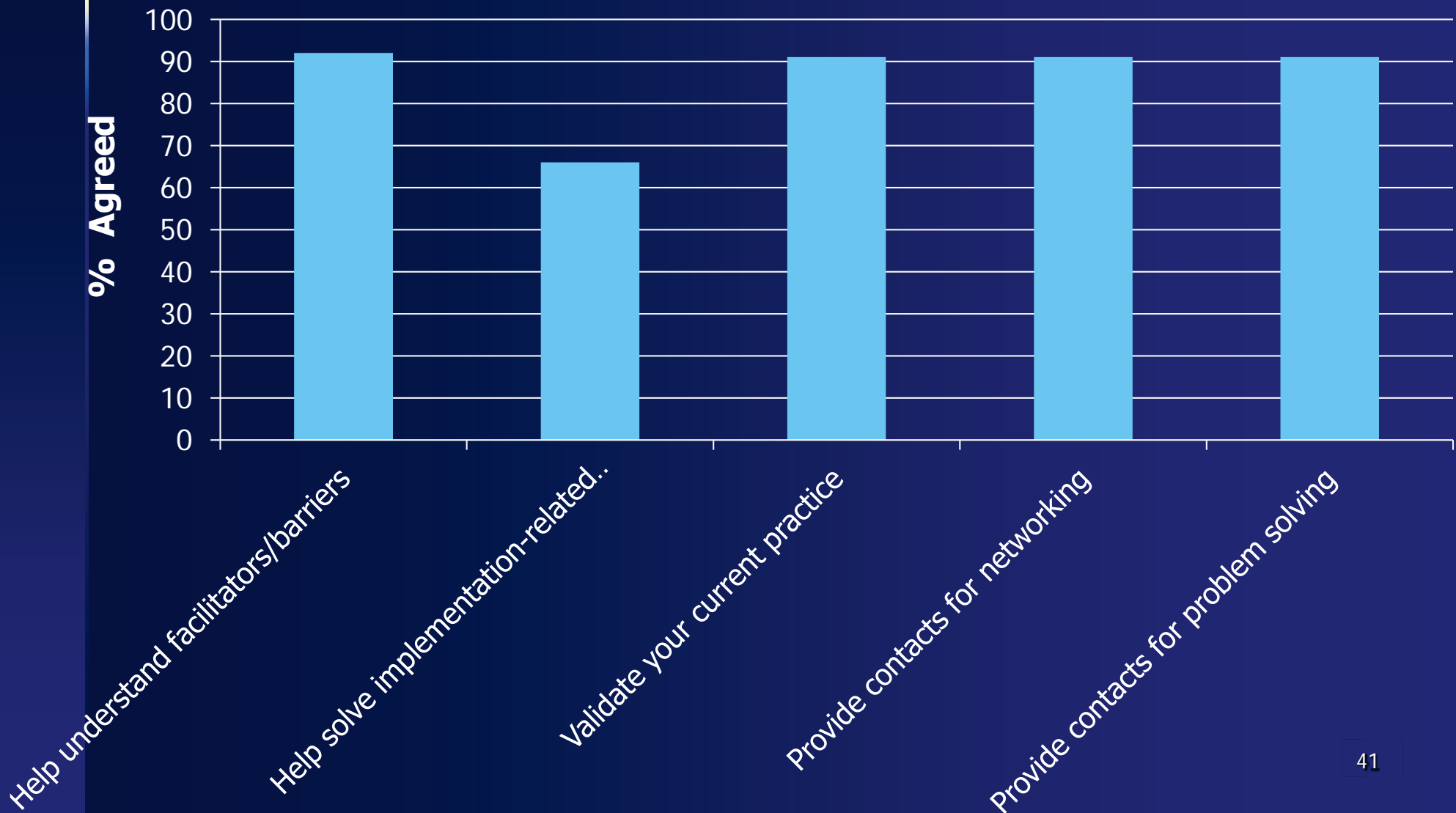


Results from Phase 1 Formative Evaluation of the HF Network

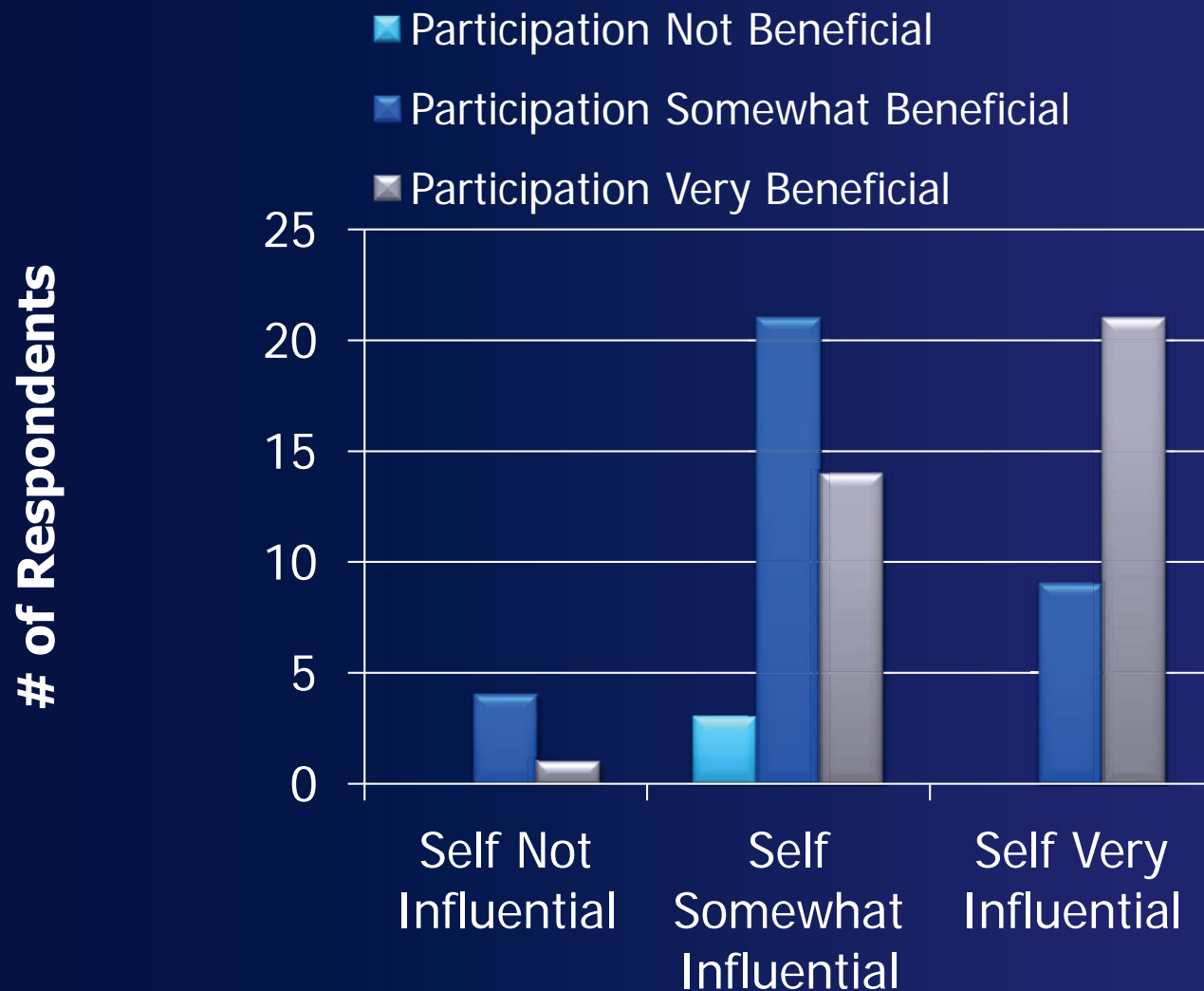
Survey: Which of the following activities have been helpful to YOU?



Survey: Overall, did participation in the HF Network sessions influence YOU in terms of the following?



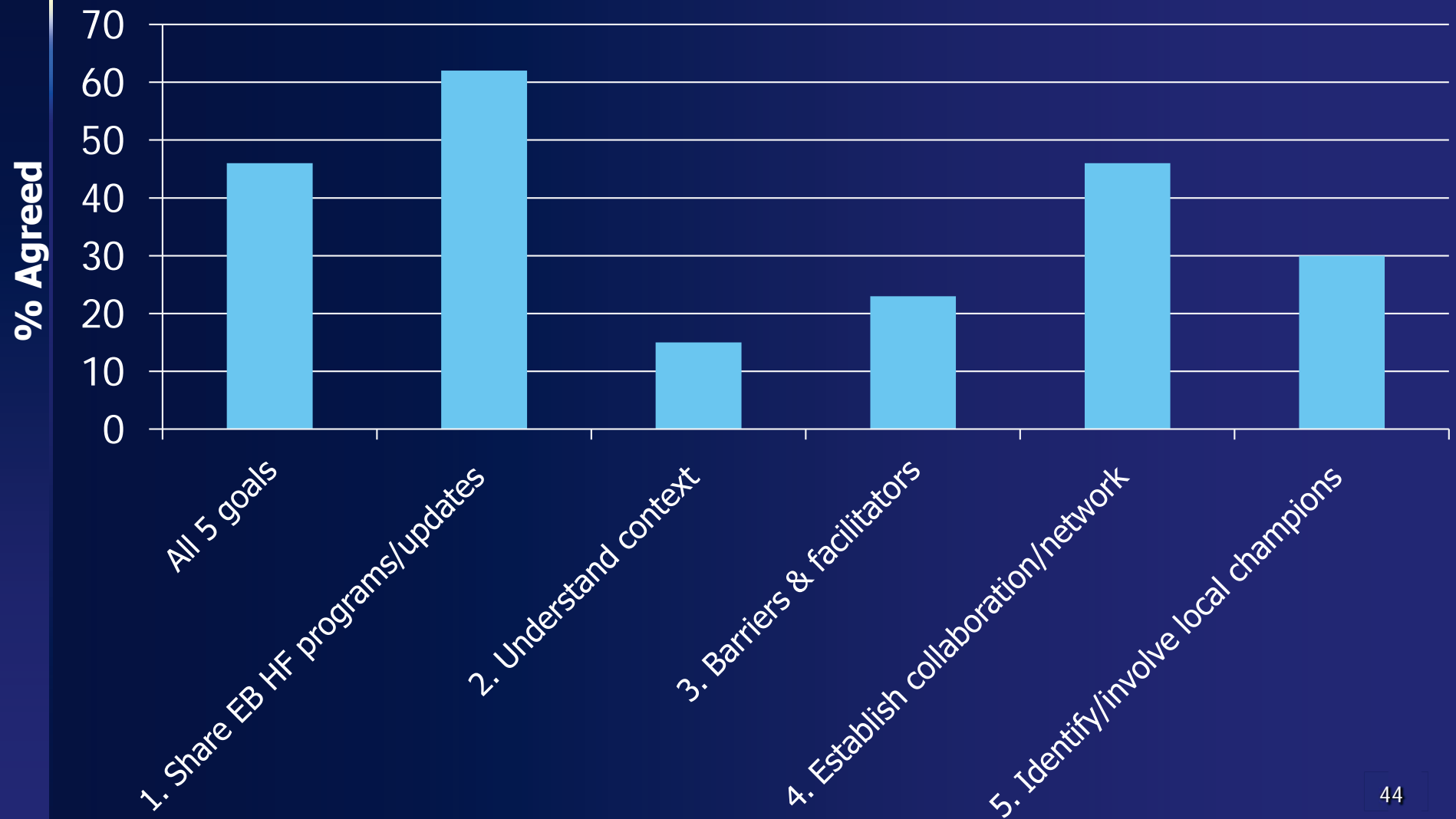
Survey: Benefit of Participation in the HF Network for Influential Members



Goals of the HF Network (revisited)

1. Share evidence-based HF programs and updates in HF care
2. Understand the context (e.g., facility, culture, leadership style, HF program)
3. Learn about barriers and facilitators to improve HF care
4. Establish collaborations/networking among members of the HF Network
5. Provide opportunities to identify/involve local champions at facilities

Interview: Which goals do YOU think have been achieved by the HF Network at least to a moderate extent?



Interview: What do you believe are the most significant **BARRIERS** to the success of the HF Network in achieving these goals?

1. Limited time
2. Short-staffed
3. Limited resources/info
4. Poor communication
5. Other (e.g., administrative difficulties in implementing new HF protocols; differences in facilities in pt flow and difficulty translating best practices between facilities)

Interview: What do you believe are the most significant **FACILITATORS** to the success of the HF Network in achieving these goals?

1. Moral support (supervisory/network)
2. Information on utilization (information or ideas shared with the purpose of future improvements)
3. Forms of Media (which helps disperse information such as phones and emails)
4. Other (e.g., person's own commitment to HF specialty care; and continuing to hear new ideas in HF care)

Interview: Members' perceptions of the value HF Network

- ❖ "I have several people calling me...we are sharing a lot of knowledge so everyone doesn't have to start at "ground zero."
(*Nurse Practitioner*)
- ❖ "What I learn and bring out of the program [session], I usually share with the 2 physician extenders and the other provider."
(*Clinician*)
- ❖ "These national calls are extremely helpful. Like I said, especially to a facility like us where we don't have the expertise here...we could really be off the mark in our management of what we're doing here to us." (*Nurse*)
- ❖ "So to me, it seems like it's a very nice way for the different facilities to share what's worked and what's not worked and to brainstorm and share different ideas, so other people listening can take that and also implement those at their site." (*Pharmacist*)⁴⁷

Planning Phase 2: Formative Evaluation of the HF Network

Phase 2: Formative Evaluation Planning

- Survey and interview guide are being finalized to conduct Phase 2 of the formative evaluation.
- RRP proposal has been submitted to seek funding for this evaluation.
- CHF QUERI core funds will also be used.

Phase 2: Formative Evaluation Planning (contd.)

- Mixed methods approach will be used.
- **SURVEY:**
 - All current HF Network members will complete a web-based survey.
 - Non-HF Network members (n=40) will complete a web-based survey
- **INTERVIEW:**
 - Selected HF Network members (n=30) will participate in semi-structured phone interviews

Conclusions

- As a CoP the HF Network has provided an informal forum to share and exchange ideas, and combine tacit and explicit knowledge.
- Variety of activities provide opportunities to members to find “best-fit” in own area of interest.
- Results from formative evaluation will be used to:
 - a. Make modifications to improve its value for participating members and VHA leadership;
 - b. Growth of similar CoPs within social networks focusing on other health conditions for veterans.

Contact Info

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