

**Northwest Renal Network Quality Improvement Projects**  
**July-December 2012**  
**Final Reports**  
December 15, 2012

**Overview**

See the Network QIWP for full Project details. The four Projects were:

**1.a. Improve Prevalent-Patient AVF Rates** at Facilities with Low AVF-in-Place Rates; thirteen facilities, *goal of five or more improvements not met, as only four improved.*

**1.b. Increase Incident-Patient AVF-in-Place Rates** at Selected Facilities; three facilities, *goal of one or more improvement, which was met.*

**1.c. Decrease Long-Term Catheter Rates;** nine facilities, *goal of three or more improvements not met, as only two improved.*

**1.d. Facilities with Multiple Opportunities** for Improvement; three facilities, *goal of one or more improvement, which was met.*

**Participation**

Overall, facilities returned about **61%** of the documents requested of them. On an individual facility basis, participation ranged from 22% to 100%. There was no discernible overall correlation between participation rate and CPM improvement.

### **Task 1.a. Improve AVF Rates at Facilities with Low AVF-in-Place Rates**

This Project involved thirteen Network facilities with AVG rates higher than the Network average, that were in the 2011-2012 Task 1.a. Project, and that finished the 2011-2012 Project with *AVF-in-place* rates below the Network goal *for AVF-in-use*. The Network goal was to see improvement at five or more of the thirteen facilities. The primary effort was to encourage facilities to evaluate patients with AVG, to see if any would be candidates for AVFs when their grafts failed.

**Participation:** The overall participation rate (P) was 57%. Two facilities returned all of the documents requested of them, and also responded to Network emails. At the other facilities P ranged from 22% to 89%. At the facilities which improved, P was 100%, 100%, 67%, and 33%. One facility did almost everything asked of it (P=89%) but its CPM was unchanged. At the two facilities with no CPM improvement, P was 62% and 67%, but these two facilities are located in one of the Network's "graft culture" zones. At facilities which did not submit enough information to know if their CPM improved, P was 22%, 25%, 38%, 55%, 55%, and 62%.

**Results:** The goal was not met. Only four facilities demonstrated improvement. Three did not. The other six did not submit enough information for the Network to be able to discern whether there was an improvement or not.

**Feedback:** Six of the thirteen facilities returned the Feedback Questionnaire.

- All six claimed to understand why their facility was chosen for the project, to understand the aim of the project, and to understand their role in the project, although it was clear that one of these did not understand the project.
- The Project assigned WebExes on the Network website. Three of the six found them useful, the other three did not.
- Four of the six found doing an RCA useful, two did not.
- Remaining obstacles to increasing AVF rates included increasing patient census, surgeon preference, poor surgery quality, AVF maturation, and surgeon availability (two facilities).
- Only one of the six changed their VA assessment process, five did not.
- Three of the six felt better able to troubleshoot VA problems, three not.
- Five of the six shared Project information with fellow staff members, one did not.
- Changes in practice included putting pressure on nephrologists and surgeons to place AVF, asking surgeons to call facility if they are considering a graft, greater staff involvement and discussion, better tracking and progress monitoring, and a new surgeon in town.

## **Lessons Learned:**

- Even after ten years of Fistula First Projects, and after repeated effort to explain the Project, several facilities still do not understand that fistulas are preferred over grafts, and several still do not take responsibility for their patients' access types. At those facilities, much more time and effort will be necessary to re-educate and motivate facility staff, including Medical Directors.
- Some of these facilities suffer from lack of nearby surgeons who are able to consistently place working AVFs, and who either place AVGs instead, or place AVFs that fail. When surgeons are not local, this places a serious burden and risk on patients. It is hoped that the Network's Surgeon Monitoring Program will eventually impact at least part of this problem.
- More effective methods to assure participation must be invented, and they must be much more efficient at using Network resources.

### **Task 1.b. Increase Incident-Patient AVF-in-Place Rates**

This Project chose three facilities in medium-sized communities with very low incident-patient AVF-in-place rates. The equivalent 2011-2012 Project was very successful at improving this rate using a targeted workshop, and appeared to work better in medium-sized communities than in larger communities. Without the workshop, this Project aimed to explore whether the Networks Best Practices document and WebEx on this CPM would be useful for spurring improvement. The goal was to see improvement in at least one of the facilities.

**Participation:** Overall participation (P) was 74%. At the facility which improved, P was 55%. At the two facilities which did not, P was 77%. All facilities took the Project seriously.

**Results:** Goal met. One facility did improve, one showed no change, and one declined. All three facilities responded positively and seemed to make progress at improving processes. One facility was very proactive, and enlisted other nearby facilities as well.

**Feedback:** Only one facility returned their Feedback Questionnaire.

- They felt that Project scope and facility expectations were clearly explained to them.
- They found the WebEx and completing an RCA to be useful, but not the Best Practices document.
- Their remaining major obstacle was nephrologist discomfort being proactive at stage 4, and they anticipated that physician follow-through could be a future barrier.
- They did not change their VA assessment process.
- They did share Project information with other staff.
- Additional resources that they would find useful include material on early placement aimed at patients, and resources on patient denial aimed at physicians.

**Lessons Learned:** The number of incident patients at most Network facilities is not large enough over a short time period to make robust measurements possible, and the data for this project is based on a very small sample. Pooling measurement over facilities would be a better strategy for short time periods.

### **Task 1.c. Decrease Long-Term Catheter Rates**

This Project, aimed at reducing catheter use for more than 90 days without placement of a permanent access, involved nine facilities that failed to improve in the corresponding 2011-2012 Project. The Project aimed to increase facility attention to the issue by explicit listing of catheter patients, and to re-expose facilities to the Network WebEx on the subject. The Project goal was to show improvement in at least three of the nine facilities.

**Participation:** Overall participation rate (P) 72%. Two facilities returned all documents requested of them; one improved their CPM and the other did not. At the other facility with improved CPM, P was 89%. At the other two facilities with no CPM improvement, P was 62% and 75%. At the four facilities that did not submit enough information to allow discernment of CPM progress, P was 25%, 50%, 55%, and 75%.

**Results:** Project goal not met. Two facilities improved, two facilities remained the same, one facility went backwards, and the remaining four did not submit enough information to be able to identify whether they made any progress.

**Feedback:** Five of the nine facilities returned the Feedback Questionnaire.

- All five felt clear about Project goals and facility expectations.
- Four found the WebEx and the RCA useful, and the fifth did not answer the questions.
- Four found the Patient Listings useful, and one did not.
- Four had a protocol for catheter-only patients, and the fifth was mute.
- All five facilities re-evaluated patients monthly.
- Two changed their assessment process, one to be more aggressive, and one got nephrologists to be more open to AVFs. Three did not change.
- Two facilities reported frequent AVF revisions, one said no, and two did not answer.
- All five shared Project information with other staff.
- Changes in practice included the realization of the need to change and great awareness of the issue, more focused review and earlier referral, more frequent assessment, and more assertiveness on surgery scheduling.
- All five professed commitment to “catheter last.”

**Lessons Learned:** At most of these facilities, improvement occurs because the rate of death exceeds the rate of catheter-only transfers in, as most of these patients do not have suitable remaining veins because of prior failed surgeries. It is hoped that the Network’s Surgeon Monitoring Program will eventually impact at least part of this problem in subsequent cohorts of patients. These rates will not change quickly.

### **Task 1.d. Facilities with Multiple Opportunities for Improvement**

While all four facilities in the parallel 2011-2012 Project improved, three of them had additional CPMs that merited improvement. One facility worked on improving their AVF rate, a second on reducing their LTC rate, and the third on improving their percentage of patients with serum albumin meeting target levels.

**Participation:** Overall participation 74%. At the facility that improved, P was 88%. At the other two, it was 55% and 78%.

**Results:** The Project goal was met. The serum albumin facility met its goal. One facility was uncooperative, and the third did not report enough data to make a conclusion feasible.

**Feedback:** One facility returned their Feedback Questionnaire. They felt clear about the Project aims and expectations. They did not watch the Network QAPI WebEx. They felt competent to do RCAs and action plans. They now utilize ongoing QAPI development, focus on outliers and increased follow-up, have changed their QI processes “a great deal,” and are refining their QI tools for next year.

**Lessons Learned:** Two of these facilities continue to need close monitoring and assistance, which the Network was unable to provide adequately because of a shortage of resources and the short timespan of the Project. One of these two facilities was eager to change but needed more hand-holding. At the other, direct and persistent intervention with the Medical Director will be required, as the facility staff felt powerless to change the Medical Director’s perspective. The facility that met its goal appears to have addressed the QI inadequacies of the last several years and, pending good CPMs at their next benchmark, has graduated from this Project.