Transitioning from an Individual QI Project Format to a Departmental QI Project in an Academic Family Medicine Clinic

Wake Forest Baptist Health Department of Family & Community Medicine Presenters: Dr. Richard Lord, Dr. Emily Mann, Dr. Kaitlyn Watson



Learning Objectives:

On completion of this session, the participants should be able to...

1. Describe the benefits of a departmental versus individual QI project.

2. Describe how to transition from an individual-based QI project to a departmental QI project in an academic Family Medicine clinic, and how to submit the project for ABFM part IV credit.

3. Describe common barriers to a departmental QI project and how to troubleshoot them.

Reasons for Change:

a) Shift project focus to population health and team-based research

b) Implement a larger-scale project with more potential for practice change

c) Foster teamwork and an interest in quality improvement and academic research

d) Fulfill both the departmental QI project graduation requirement (third year residents), as well as the part IV ABFM cycle requirement for providers

Importance:

a) Given the increasing focus on quality improvement and care measures in primary care in the US, it is important for all Family Medicine residents and providers to be familiar with the QI process (e.g. PDSA cycle used for our project), the concept of population health, and team-based research.

b) We believe that the educational benefit of a departmental QI project as opposed to an individual project is greater because of the larger number of patients and providers involved, and the multiple opportunities to learn from group meetings and troubleshooting meetings.

Project Stages

Generation of Project Idea and Goals:

- Chief residents and faculty mentor developed idea during a chief retreat weekend in Asheville, NC focused on Geriatric CME (Spring 2015)
- Presented idea to Department Chair and Clinic Manager to garner support and approval for the project, as well as to develop specific goals (e.g. 85% vaccination rate for each of Prevnar, Pneumovax, and Zostavax vaccines in our elderly (60+ years) clinic population)
- Chief residents developed patient vaccination prompt and obtained approval from project mentor and Department Chair (see Appendix A for vaccination prompt)

Dissemination of Project Information to Department Providers and Staff:

- Chief residents presented project details and goals to faculty providers at faculty meeting one month prior to implementation date, and to resident providers at academic half-day one month prior to implementation date, in order to obtain support, buy-in, and feedback
- Detailed email disseminated to all providers after these meetings
- Detailed email disseminated to all clinic staff explaining patient vaccination prompt distribution (project start date, target patient population, etc.)
- After intervention, IT staff distributed each individual provider's pre-intervention and intervention data to them in secure manner (see Data Analysis below)

Data Collection in Clinic:

- Patients 60 and older given vaccine prompts to fill out in waiting room upon check-in from October 12, 2015 November 11, 2015 (see Appendix A for vaccine prompt)
- Patients gave completed vaccine prompts to providers during visit —> providers placed appropriate orders
- Vaccine prompts to provider folder after clinic visit

Troubleshooting:

- Many providers not placing completed vaccine prompts in designated folder
- Solution: completed forms placed in Medical Records basket and scanned to patient charts per usual clinic flow
- · Front desk clinic staff forgetting to give forms to eligible patients
- · Solution: regular e-mail reminders
- Patient refusal of vaccines
- Zostavax: need insurance approval prior to administration, so patients would have to make extra clinic visit to obtain it (whereas Prevnar and Pneumovax could be given on the spot)

Analysis of Results:

- IT staff created individual report for each provider, including all patients 60 and older seen during the pre-intervention period (August 2015), as well as the intervention period (October 12, 2015 - November 11, 2015) — distributed to each provider in secure manner so each could perform appropriate chart review, analysis and evaluation of individual data, and submission of project to ABFM for part IV credit
- Pre-intervention data: Prevnar, Pneumovax, and Zostavax vaccination rates in minimum of 10 patients 60+ years seen during August 2015 for each individual provider (August 2015 chosen as faculty and staff were unaware of project at that time)

- Intervention data: Prevnar, Pneumovax, and Zostavax vaccination rates in minimum of 10 patients 60+ years seen during intervention period (October 12, 2015 - November 11, 2015)
- See example data analysis spreadsheet in Appendix B using this resident's patient panel as an example, Prevnar vaccination rate went from 25% pre-intervention to 90% overall (but 83% for those patients that were actually eligible for vaccination at the time of the visit with the vaccine prompt others had been vaccinated prior to visit, so weren't technically eligible during the intervention visit); Pneumovax rate: 73% to 92% overall; Zostavax rate: 18% to 28.6% overall (these patterns were similar across providers)

Submission for ABFM Part IV Credit:

- Website for application for self-directed part IV credit: <u>https://theabfm.mymocam.com/</u> <u>selfdirected/</u> (apply for custom QI effort with identified measures for pre- and postintervention data collection on focused area)
- Chief residents submitted project proposal/application via above website for approval, several months prior to intended start date of project (8-10 weeks for approval, and approval is good for 2 years)
- After intervention, each physician then submitted his/her own data, analysis, and meaningful participation/analysis question answers on MOCAM website
- Requirements: must meet meaningful engagement and participation requirements (<u>https://assets.mocactivitymanager.org/ABFM/ABFMExtPIReqts.pdf</u>)
 - · Incorporate self-evaluation, pre- and post-intervention audits
 - · Provide direct care to patients as part of the project
 - Actively develop a QI plan and implementation/interventions
 - Review project data outcomes (individual and comparison to peers/department)
 - Demonstrate active collaboration in the implementation of the activity (e.g. team meetings, etc.)
 - At least one complete QI cycle
 - · At least 10 patients in each phase
 - Must be started and completed within 1 year period
 - Department chair attested/cosigned each submission
 - Takes 4-8 weeks for individual project certification/approval (something to keep in mind when planning for ABFM board exam registration, ABFM certification cycle deadlines, etc.)

Future:

Continued team/departmental QI project on 1-2 year cycle

Appendix A

[insert patient sticker here]

Family Medicine Vaccine Questionnaire

1. Have you ever received the Prevnar pneumonia vaccine, and if so, at what age? (circle one)

Yes (age if known: _____) No Don't Know

2. Have you ever received the Pneumovax pneumonia vaccine, and if so, at what age? (circle one)

Yes (age if known: ____) No Don't Know

3. Have you ever received the shingles vaccine (Zostavax)? (circle one) Yes (age if known: ____) No Don't Know

Please give this form to your provider during your visit so that we can ensure that you are up to date on your vaccines. Thank you!

Appendix B

* = vaccinated at that visit with the vaccination prompt intervention

	MRN	Age	Prevnar	Pneumovax	Zostavax
Before intervention	а	79	n (eligible)	У	n (eligible)
	b	61	n (not eligible due to age 61)	n (eligible due to asthma)	n (eligible)
	С	68	n (eligible)	У	У
	d	62	n (not eligible due to age 62)	У	n (eligible)
	е	68	n (not eligible until 12/22/2015)	У	n (eligible)
	f	67	n (eligible)	n (eligible)	n (eligible)
	g	62	n (not eligible due to age 62)	У	n (eligible)
	h	64	n (not eligible due to age 64)	n (eligible due to tobacco use)	n (eligible)
	i	62	n (not eligible due to age 62)	У	У
	j	67	n (not eligible until 5/8/2016)	У	n (eligible)
	k	78	У	У	n (eligible)
Vaccination rate for ELIGIBLE patients in before- intervention period			25% (1 of 4 eligible patients vaccinated)	73% (8 of 11 eligible patients vaccinated)	18% (2 of 11 eligible patients vaccinated)

	MRN	Age	Prevnar	Pneumovax	Zostavax
After Intervention	I	60	n (not eligible due to age 60)	У	n (eligible)
	m	79	У*	У	n (eligible)
	n	76	У	У	n (eligible)
	0	60	n (not eligible due to age 60)	У	n (eligible)
	р	68	У*	У	n (eligible)
	q	81	n (eligible but declined)	n (eligible but declined)	n (eligible but declined)
	r	85	У	n (not eligible until 4/7/2016)	n (eligible)
	S	82	У*	У	У
	t	67	У*	n (not eligible until 10/24/2016)	n (eligible)
	u	67	У	У	У
	v	76	У*	n (not eligible until 10/23/2016)	n (eligible)
	w	64	n (not eligible due to age 64)	У	У
	x	69	n (not eligible until 12/17/2015)	У	У
	У	79	У	У	n (eligible)
Vaccination rate OVERALL in after-intervention period			90% (9 of 10 patients covered with vaccine overall)	91% (10 of 11 patients covered with vaccine overall)	28.6% (4 of 11 patients covered with vaccine overall)
Vaccination rate for ELIGIBLE patients in after- intervention period (= success rate of vaccination with prompt)	"Eligible" = due for vaccination and had NOT received it prior		83% (5 of 6 eligible patients vaccinated) — success rate of vaccination with prompt	0% (0 of 1 eligible patients vaccinated) — success rate of vaccination with prompt	0% (0 of 10 eligible patients vaccinated) — success rate of vaccination prompt