Poster Presentation

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Community Outreach and Change for Diabetes Management: Assessing Quality Improvement in Local Health Departments

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Community Outreach and Change for Diabetes- COACH 4 DM: Assessing Quality Improvement in Local Health Departments

BACKGROUND
Diabetes in Kentucky

- 11% of KY adults have Diabetes!
  - 9th in the nation
- 6th leading cause of death in KY
- 40% of KY adults have pre- diabetes
- Estimated costs > $3 billion

COACH 4 DM PROJECT AIM

- Evaluate the extent to which organizational QI strategies influence the adoption and implementation of evidence-based interventions identified in the Community Guide to Preventive Services

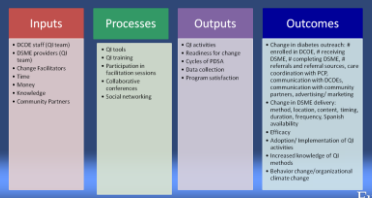
Community Guide

- Sufficient evidence to recommend that Diabetes Self Management Education (DSME) be provided to adult diabetics in community gathering places

COACH 4 DM Overall Purpose

- Test whether evidence- based QI Training & Facilitation leads to systems changes and process improvements with local health departments (LHDs)

Logic Model



METHODS
Study Participants

- Six LHDs who provide DSME
  - 4 District LHDs (6-10 counties each)
  - 2 Single County LHDs
- Each LHD designated a QI team (4-6 individuals)

Study Design and Protocol

- Quasi-experimental Pre/ Post test design
- QI teams received QI training and project facilitation based on:
  - AHRQ Putting Prevention into Practice
  - IHI QI Collaborative
  - Embracing Quality in Local Public Health: Michigan's QI Handbook
- QI Training & Facilitation:
  - Three ½ day sessions
    - Specific focus on PlanDoStudyAct (PDSA)
    - Also included RCA, Fishbone diagram, logic models, & flow mapping
- QI teams expected to develop and implement a QI project
- Project period 9 months

Survey Tools

- Survey I assessed knowledge and comfort level using QI before and after QI training
  - Likert Scale (1 Low- 5 High)
- Survey II assessed capacity measures of DSME services before and after QI training

RESULTS
Pre- Test

- Reported high levels of knowledge and comfort using QI in general
- Reported low levels of knowledge and comfort with specific QI tools
  - 41% reported NO knowledge of PDSA

Pre/ Post Test

Ranking of Knowledge of Specific QI Tools (1 Low-5 High)

QI Tool	1 Pre	Post	2 Pre	Post	3 Pre	Post	4 Pre	Post	5 Pre	Post
PDSA	41%	9%	21%	5%	21%	9%	10%	**64%**	7%	14%
RCA	44%	13	21%	30%	28%	**30%**	7%	17%	0%	9%
Fish-bone	51%	17%	7%	22%	35%	9%	7%	**48%**	0%	4%
Logic model	35%	9%	35%	17%	10%	**39%**	20%	22%	0%	13%
Flow Map	24%	4%	10%	4%	45%	26%	17%	**48%**	3%	17%

Ranking of Comfort Using Specific QI Tools (1 Low-5 High)

QI tool	1 Pre	Post	2 Pre	Post	3 Pre	Post	4 Pre	Post	5 Pre	Post
PDSA	**52%**	9%	7%	9%	20%	14%	10%	**50%**	0%	18%
RCA	**58%**	22%	14%	**35%**	21%	17%	7%	26%	0%	0%
Fish-bone	**51%**	22%	14%	22%	28%	9%	7%	**44%**	0%	4%
Logic model	**52%**	17%	17%	**35%**	17%	22%	14%	22%	0%	4%
Flow Map	31%	4%	7%	13%	**38%**	26%	24%	**44%**	0%	13%

RESULTS
System/Organizational Change

- 50% of LHDs reported initiating new QI activity since COACH 4 DM participation
- 50% of LHDs changed location of DSME sessions
- 50% changed timing of DSME sessions
- 50% had increase in # of providers who refer for DSME services
  - Mean increase of 4.3 referring providers
- 50% had increase in # monthly referrals
- Mean # of persons attending DSME per month increased from 28 to 32
- Mean # of participants completing entire DSME series increased from 79 to 149

CONCLUSIONS

- LHDs seeking to implement or improve their culture of QI, or improve their delivery of services related to a specific health outcome may wish to pursue QI training and facilitation.

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