Using clinical-community linkages to reduce tobacco use

Case Western Reserve University

Project Objectives:

- Work with partners at MetroHealth to:
    - Establish capacity for an eReferral to the OH State Quitine (QL)
    - Design, implement and evaluate an *Ask, Advise, Connect* model for tobacco cessation with safety net partners in Cleveland, OH
- Use secondary data to understand tobacco prevalence, practice patterns and use of community resources to identify opportunities for change.

CPCRN team

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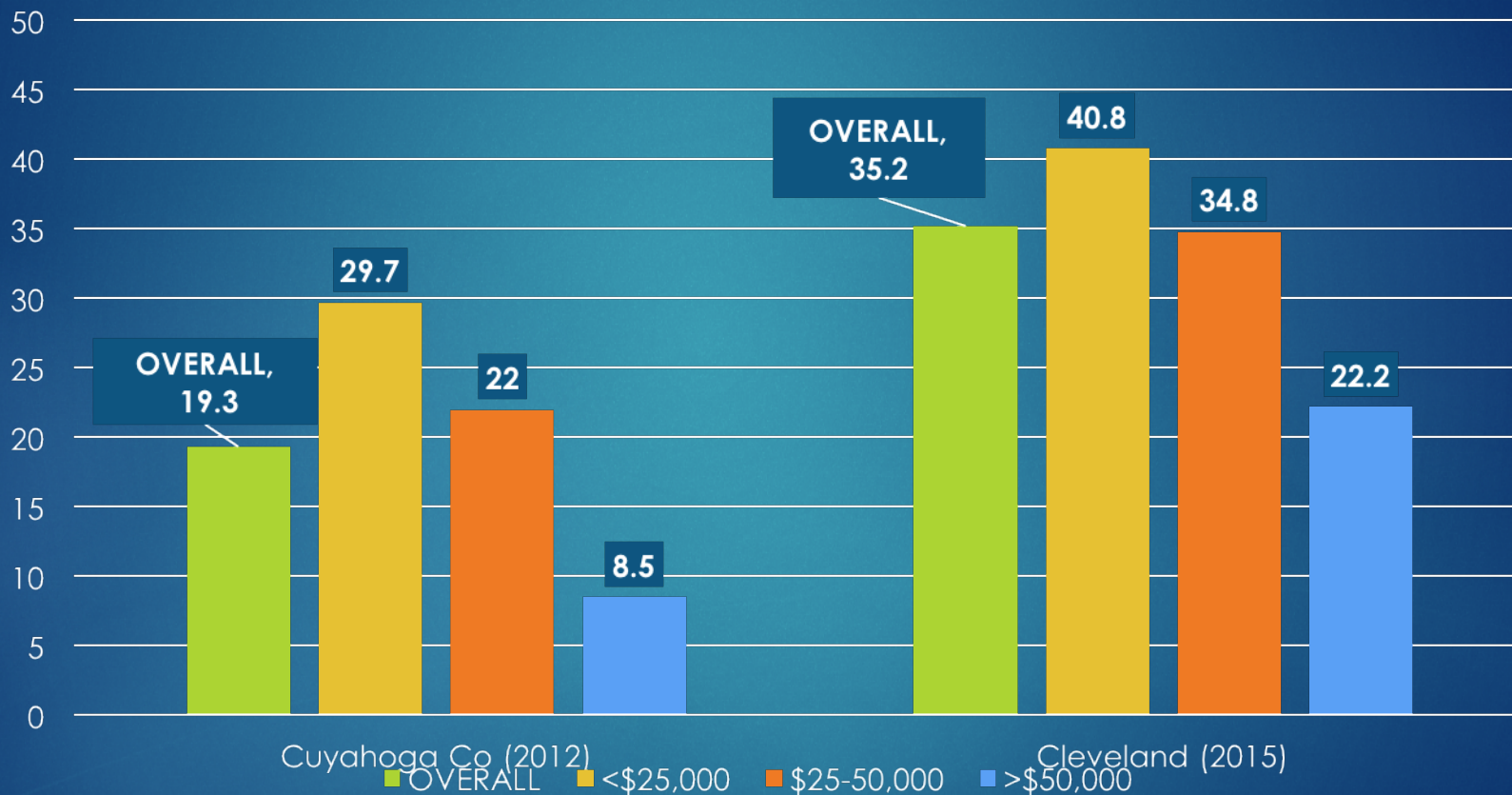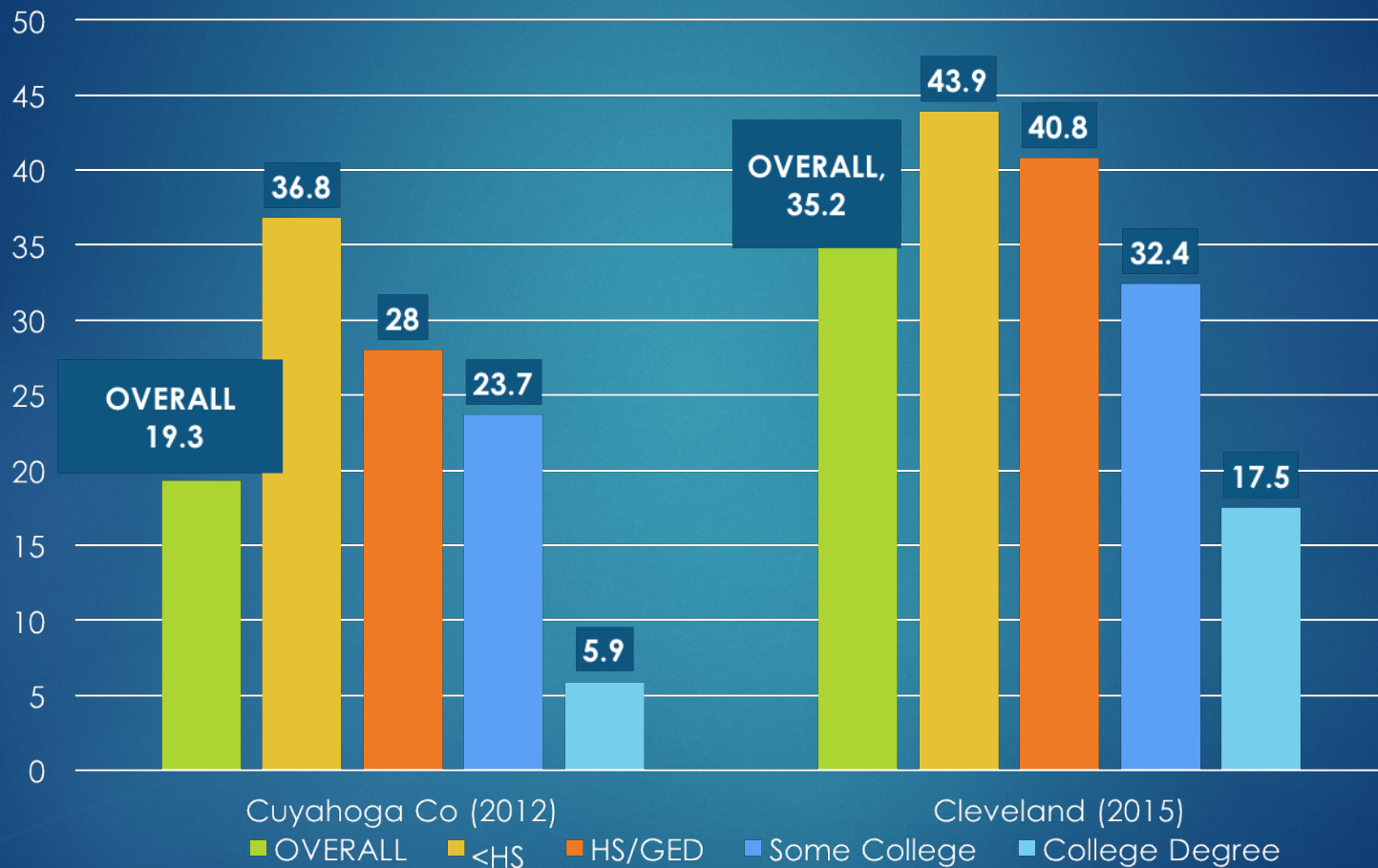CWRU

Current Adult Cigarette Smoking in Cuyahoga County (2012) and City of Cleveland (2015), Overall and by INCOME

Source: Prevention Research Center for Healthy Neighborhoods. www.PRCHN.org

Current Adult Cigarette Smoking in Cuyahoga County (2012) and City of Cleveland (2015), Overall and by EDUCATION

Baseline data

Baseline data all adult patient visits to MH primary care outpatient clinics 2014-2016

Description	Category	Overall 140,990 (100.0) Total	Current Smoker 44,365 (32.7) N (%)	Former Smoker 29,596 (21.8) N (%)	Never Smoker 61,659 (45.5) N (%)	P-Value
Gender	Male	50,982 (36.2%)	18,687 (37.8%)	12,338 (25.0%)	18,382 (37.2%)	<.001
	Female	90,007 (63.8%)	25,678 (29.8%)	17,258 (20.0%)	43,276 (50.2%)	
Age in Years	18-34	42,519 (30.2%)	13,684 (33.7%)	5,076 (12.5%)	21,859 (53.8%)	<.001
	35-64	77,746 (55.1%)	27,478 (36.6%)	16,693 (22.3%)	30,818 (41.1%)	
	65+	20,725 (14.7%)	3,203 (16.0%)	7,827 (39.1%)	8,982 (44.9%)	
Race*	Caucasian	70,820 (55.2%)	20,358 (30.0%)	16,039 (23.7%)	31,374 (46.3%)	<.001
	African American	53,596 (41.8%)	20,617 (39.6%)	10,861 (20.9%)	20,563 (39.5%)	
	Other	3,910 (3.0%)	428 (11.7%)	451 (12.3%)	2,790 (76.0%)	
Hispanic*	Non-Hispanic	123,519 (90.3%)	40,008 (33.7%)	26,290 (22.1%)	52,571 (44.2%)	<.001
	Hispanic	13,340 (9.7%)	3,204 (25.0%)	2,413 (18.8%)	7,185 (56.1%)	
Insurance Class	Commercial	46,700 (33.1%)	8,750 (19.6%)	9,438 (21.2%)	26,343 (59.2%)	<.001
	Medicaid	58,478 (41.5%)	26,021 (46.1%)	9,709 (17.2%)	20,692 (36.7%)	
	Medicare	26,482 (18.8%)	6,825 (26.6%)	8,848 (34.5%)	9,952 (38.8%)	
	Self-Pay	9,330 (6.6%)	2,769 (30.6%)	1,601 (17.7%)	4,672 (51.7%)	

Quitlines

- Evidence based strategy for assisting tobacco cessation
- Telephonic counseling services available in all 50 states.
- Eligibility and services vary by state and quitline provider

What we know:

- Few patients call on their own (2% of smokers)
- Clinician recommendation has low yield of calls (2%)
- Direct referral (fax or electronic) better yield ~ 50%
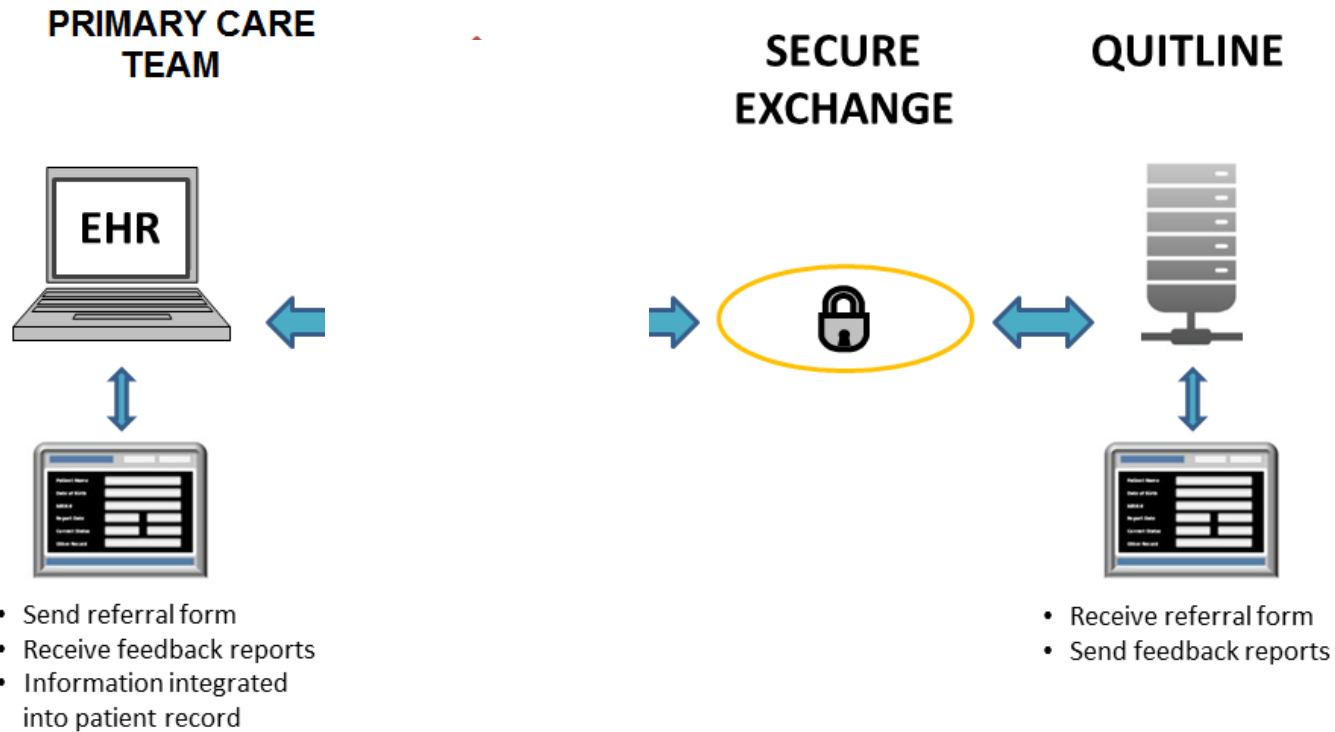- Uptake of fax referral has been low.

Quitlines & eReferral

eReferral – directly refer patient to quitline using electronic health record (EHR)
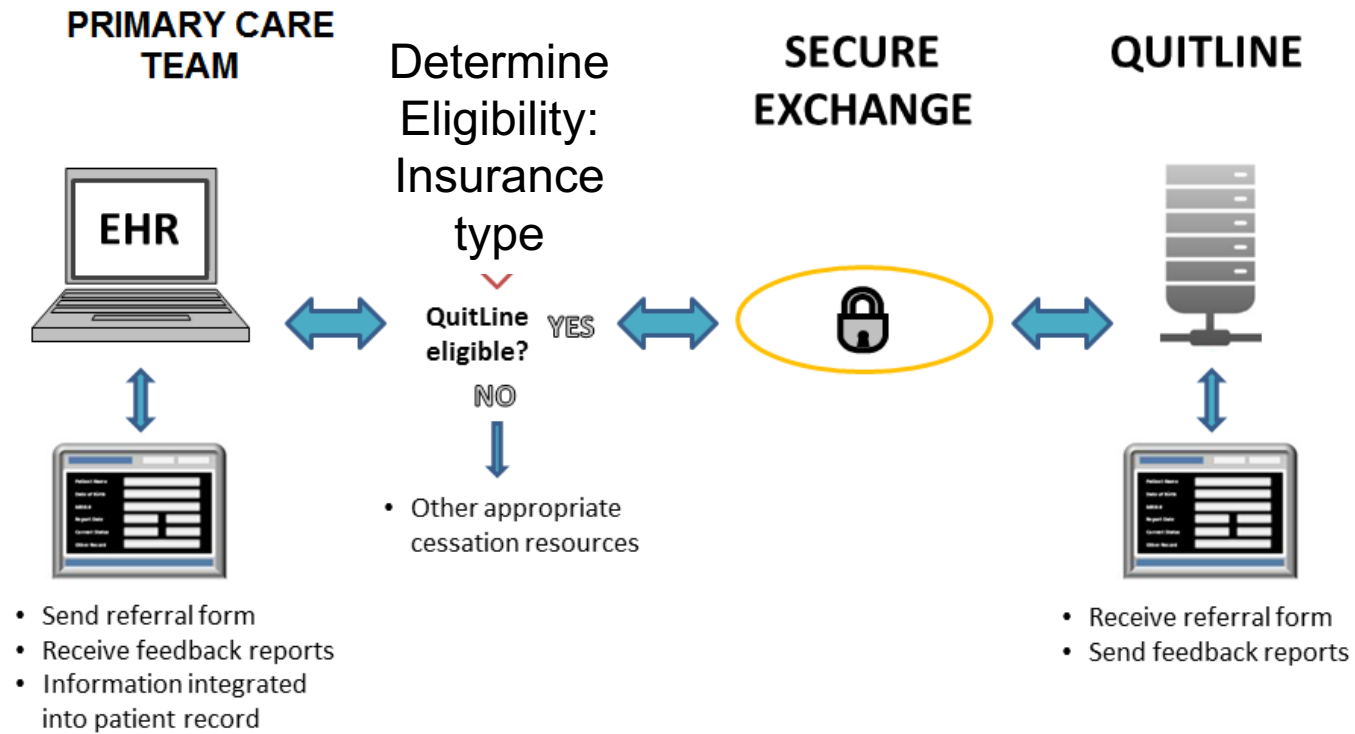
Benefits:

- Patient information is immediately sent to the QL
- QL will pro-actively call the patient
- Greater opportunity to create system-based EHR prompts and automation
- Feedback reports can be incorporated into EHR
- Potential for greater volume and efficiency

Simple Schematic of an eReferral System

PRIMARY CARE TEAM

SECURE EXCHANGE

QUITLINE

EHR

- Send referral form
- Receive feedback reports
- Information integrated into patient record

- Receive referral form
- Send feedback reports

Simple Schematic of an eReferral System

Ask-Advise-Connect Strategy

A systems-level approach that engages medical assistants to:

Ask about smoking status,

Advise smokers to quit and

Connect those that are ready to the state Quitline. (using an e-Referral)

Patients enrolled in the Ask-Advise-Connect arm were 12 times more likely to enroll in QL treatment than patients who received a passive referral.

Vidrine et al. 2011, 2013

eReferral Implementation Study

Aim: To evaluate the implementation and uptake of the Quitline eReferral through the Ask-Advise-Connect model.

- Establish eReferral capacity
- Design changes to EHR and work flow
- Develop Ask-Advise-Connect trainings and support materials
- Pilot test implementation – 2 clinical sites

Ask-Advise-Connect & eReferral project

Partners:
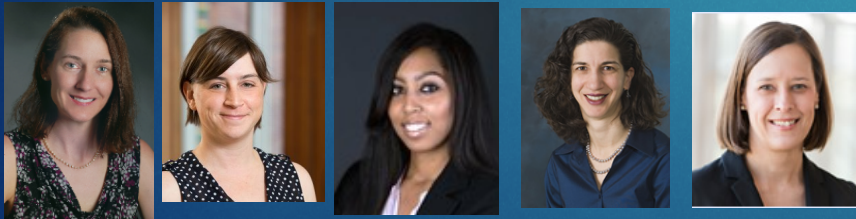
MetroHealth

Ohio Department of Health

Quitline providers for Ohio: NJH

eReferral project

Accomplishments:

▶Exceptional health system buy in and sustained effort – will reflect long-term practice changes at MetroHealth

▶Programming to establish the data exchange complete

▶EHR fields adapted to satisfy MH meaningful use requirements

▶Updated tobacco sections and user instructions completed for MTAs and nurses

▶Created a 'best practice alert' to sort patients by Quitline eligibility

▶Developed a tip sheet for EHR training / future employees

▶**Implemented the process in 2 primary care sites**

Tip Sheet and example of a new section programmed in EPIC

Epic TIP SHEET

Tobacco Screening

The purpose of this project is to promote partnerships between primary care clinics and community resources in order to increase the delivery of smoking cessation services to those who are least likely to access them. As an effort to improve the reach, effectiveness and patient-centeredness of tobacco cessation assistance to patients who smoke using an eReferral approach integrated into the EHR. MTAs and nurses will identify MetroHealth patients who are smokers interested in quitting and refer them to cessation services through the Ask, Advise, Connect model.

- Ask – determine smoking status
- Advise – recommend quitting
- Connect – offer eReferral to assist quitting

Once referred, the quitline will contact eligible patients to provide cessati[...] morbidity and mortality due to tobacco use.

Try It Out

There are four new sections added to the Visit Navigator related to tobac[...] use for cigarettes only, **other tobacco use**, and **assess readiness to quit**.
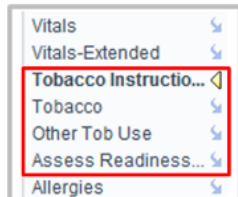
1. **Tobacco Instructions – Recommended questions for tobacco [...]**
   Instructions: Section 1 should be used to provide guidelines to determine smok[...]
   - At the top left a list of recommended questions is provided to **ASK** patie[...]

Empower the staff:
- They provide advice statement;
- They sign the referral order.

Ask Advise Connect: A Tool that Works!
eReferral Feedback Report – site 1

Indicator	1 month before AAC launch	1 month after	2 months after	3 months after	4 months after
# of visits	*1515*	*2154*	*1982*	*1999*	*1426*
% Ask (in the last 30 days...)	45.7%	65.9%	68.3%	62.5%	65.9%
# of visits by tobacco users	*296*	*515*	*505*	*449*	*339*
% Advise – original ACO field	27%	79.8%	70.5%	61.9%	64.7%
% Advise – new statement	--	67.2%	73.2%	70.4%	80.8%
% Assess Readiness	3.7%	85.8%	85.5%	80.6	83.8%
# ready to quit in next 30 days	*9*	*210*	*168*	*156*	*104*
% offer Connect	--	100%	100%	100%	100%
% Accepted Referral	--	40.9%	24.4%	18.6%	18.3%

Ask Advise Connect: A Tool that Works!
eReferral Feedback Report – site 2

Indicator	1 month before AAC launch	1 month after	2 months after	3 months after	4 months after
# of visits	*2848*	*2304*	*2894*	*2682*	*2778*
% Ask (in the last 30 days…)	49.4%	61.7%	65.8%	68.8%	67.6%
# of visits by tobacco users	*429*	*508*	*646*	*636*	*638*
% Advise – original ACO field	11.9%	69.7%	72.6%	61.0%	62.1%
% Advise – new statement	--	75.0%	78.6%	81.4%	84.5%
% Assess Readiness	40.8%	87.0%	85.3%	80.8	82.4%
# ready to quit in next 30 days	*48*	*181*	*200*	*146*	*174*
% offer Connect	--	99.4%	100%	100%	100%
% Accepted Referral	2%	66.3%	64.5%	53.4%	44.3%

eReferral project – Challenges

- The project survived 2 EHR upgrades, 3rd starting in June

- Change to a new system for OB/GYN clinics, more changes to come as all are going to wide screen format for EHR interface – requires a redesign

- The primary care community director retired

- The system absorbed Kaiser Permanente practices and involved a complete restructure of clinical support staff

- Our assigned IS programmer retired mid-project.

- President of the quitline that approved the project retired, 1 year later our main contact at the quitline left the organization.

eReferral project

What's next:

- Funding by PCORI for larger trial to:
  - Extend AAC implementation to 8 community sites
  - Add a clinician intervention - teachable moment strategy
- Expand beyond primary care at Metrohealth.
- Expand to FQHC sites in Ohio
- Adapt to other health behavior topics

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√ Establish capacity for an eReferral to the OH State Quitine (QL)

✓ Design, implement and evaluate an *Ask, Advise, Connect* model for tobacco cessation with safety net partners in Cleveland, OH

▶ Use secondary data to understand tobacco prevalence, practice patterns and use of community resources to identify opportunities for change.

Secondary Data analysis

UDS data 2011-2015

- ► Burden of tobacco at FQHCs-
  - ► paper completed
  - ► Assess and assist tobacco cessation

- ► *Potentially examine other cancer screening services*
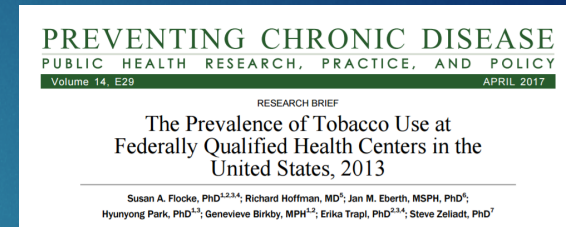
Quitline data for Ohio 2012 – 2016

- ► Replicate 2007 paper on who is receiving proactive referral

- ► Replicate paper on quitline use among underserved populations.

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RESEARCH BRIEF
The Prevalence of Tobacco Use at
Federally Qualified Health Centers in the
United States, 2013

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Hyunyong Park, PhD[1,3]; Genevieve Birkby, MPH[1,2]; Erika Trapl, PhD[2,3,4]; Steve Zeliadt, PhD[7]

Exploring new collaborative project

- The Ohio Academy of Family Physicians (OAFP), the American Cancer Society, Ohio Department of Health, the Ohio Association of Community Health Centers

- Using ACS CRC screening curriculum, primary care clinical champion model, and a practice team quality improvement program.

- Gather qualitative and quantitative data to evaluate the uptake, implementation and effect of the program; examine opportunities for augmenting the strategy. E.g. test a practice facilitator model.

CWRU strengths

- Acquisition and analysis of secondary data
- Close collaboration with health system
- Depth of experience with mixed methods
- Strong liaison with county health department
- Strong relationship with Case Comprehensive Cancer Center

Extra slides