

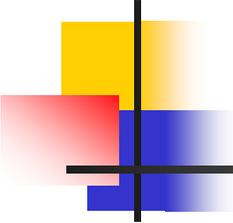
# Implementing Screening and Brief Intervention (SBI) Models to Reduce Tobacco Use and At-Risk Drinking in Primary Care Clinics in the US.

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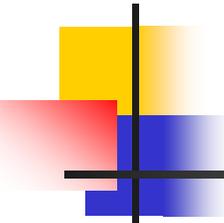
*Research funded by Prescription for Health, a national program supported by the Robert Wood Johnson Foundation*



# Presentation objectives

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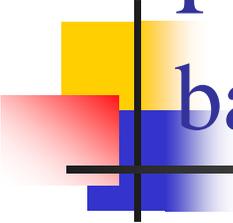
- Describe overall objectives of RWJ's Prescription for Health Initiative
- Outline specific purposes, methods and results of the alcohol and tobacco SBI implementation project
- Discuss conclusions as related to key program components and sustainability



## Organizational structure of RWJ's *Prescription for Health (P<sup>4</sup>H)* initiative

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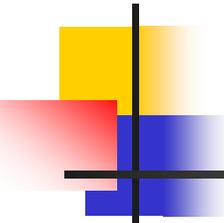
- Robert Wood Johnson Foundation (RWJ):  
*Princeton, NJ* & the Agency for Healthcare  
Research and Quality (AHRQ): *USDHHS*
  - Funded 17 primary-care practice based research  
networks (PBRN's)
  - National Program Office (NPO): *University of  
Colorado*
  - Independent Evaluation Unit (IEU): *University of  
Medicine and Dentistry of New Jersey*



## P<sup>4</sup>H projects examined primary-care based interventions

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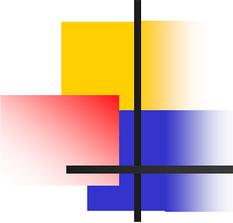
- Targeted 4 health risk behaviors
  - Diet, exercise, tobacco use, at-risk alcohol use
- Each project targeted at least 2 of the 4 health risk behaviors
  - Based on current trend to combine interventions for multiple risk factors
- Focused on effectiveness rather than efficacy
  - Implementation vs. patient outcomes
- Projects varied: models of implementation (health educators vs. clinicians; PDA-based feedback; web-based intervention; community based interventions)



## Purpose of Reducing Tobacco Use and Risky Drinking in Underserved Populations

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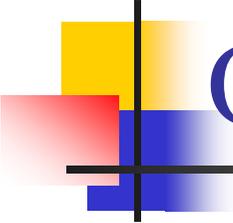
- To evaluate the implementation of integrated screening and brief interventions for smoking and at-risk drinking using three different SBI delivery models:
  - Clinician Model
    - Clinical health center staff (physician, PA or APRN) provides SBI services
  - Specialist Model
    - Non-clinical health center staff (RN, MA) provides SBI services
  - Health Educator Model
    - Outside service provider who is not a staff member of the health center provides SBI services



## New England Clinician's Forum enrolled 7 Federally Qualified Health Centers (FQHC's)

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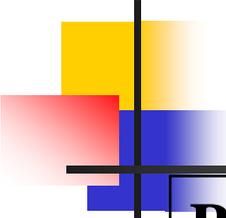
- Katahdin Valley Health Center (*Audie Horn, Jr., PA*)
  - Island Falls, ME (C Model)
  - Patten, ME (S Model)
- Neponset Health Center (*Judy Steinberg, MD*)
  - Boston, MA (C Model)
- Geiger Gibson Community Health Center (*Michael Folino, DO*)
  - Dorchester, MA (S Model)
- Community Health Center (*Daren Anderson, MD*)
  - Groton, CT (C Model)
  - New London, CT (S Model)
- Burgdorf Health Center (*Bruce Gould, MD*)
  - Hartford, CT (HE Model)



# Outcome Measures

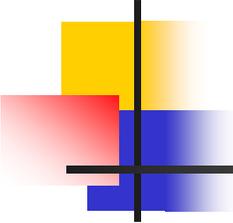
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- What was the penetration of the three implementation models (i.e., the proportion of the target population actually screened)?
- What was the participation of the target population (i.e., the proportion of smokers and risky drinkers who receive the appropriate intervention)?
- To what extent does the implementation process produce lasting changes in provider attitudes, knowledge and practice behavior?



# Methods & Timeline

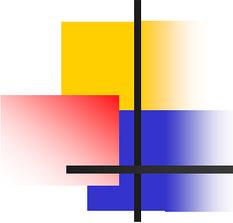
<b>Phase</b>	<b>Time Period</b>
<b>Planning Phase:</b>	3 Months
<b>Training Phase:</b>	3 Months
<b>Active SBI Implementation Phase:</b>	4 Months
<b>Sustainability Phase:</b>	4 Months
<b>Analysis and Report Writing Phase:</b>	2 Month



## Planning Phase (3 Months)

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- Conducted planning conference calls and on-site meetings with all staff coordinators
- Customized screening and brief intervention protocols based on site feedback
- Completed pre-study assessments
- Developed training curriculum with Continuing Medical Education credits
- Received IRB approvals

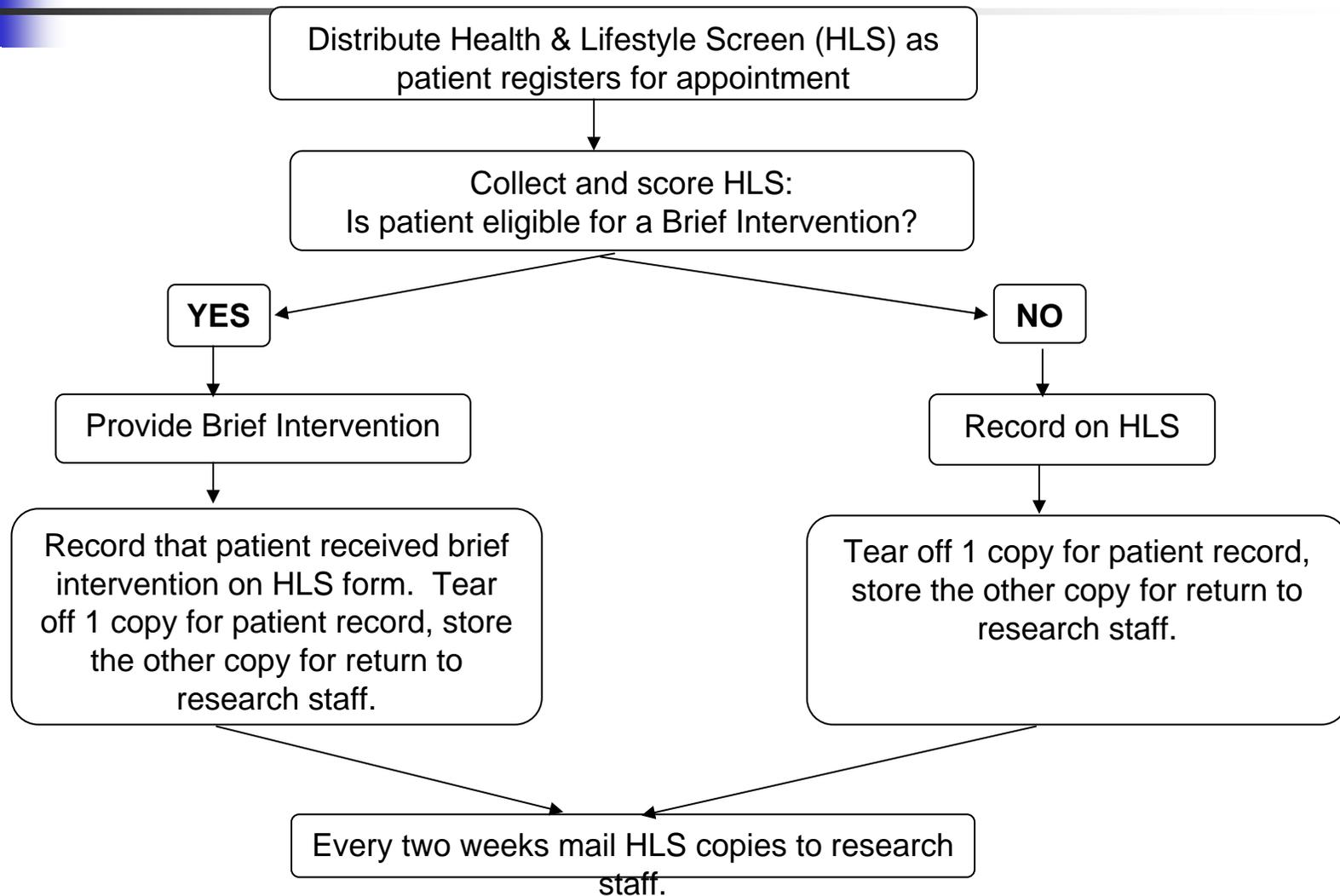


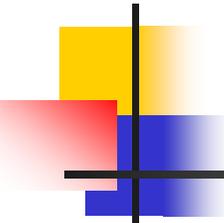
# Training Phase (3 Months)

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- Trained providers and specialists
  - 2 – 4 extended lunch sessions
  - Allowed staff to determine how best to incorporate procedures in office
  - Practiced brief interventions for tobacco and at-risk alcohol use
  - Trained staff to score and code screening forms for data collection
- Piloted procedures and provided technical assistance after training sessions
- Modified & finalized protocols and IRB approvals

# SBI Flow Diagram

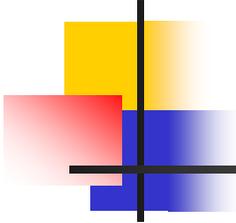




# Health and Lifestyle (HLS) Screening Survey

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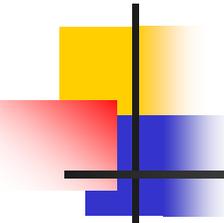
- One page form
- Included “lifestyle” questions
  - Exercise, diet, tobacco, alcohol and stress questions
- Four questions about tobacco use (3-6)
- Three questions about alcohol use (7-9)
  - First 3 AUDIT questions
- Patients perceived as part of appointment registration process



# Brief Intervention Techniques

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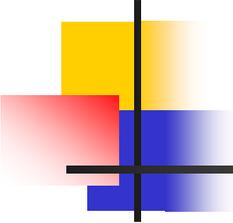
- Incorporated Stages of Change Model
- Based on a motivational interviewing or counseling style
- Tobacco BI based on AHRQ guidelines
- Drinking BI based on NIAAA/WHO guidelines
- Conduct single or combined BI



# Active SBI Implementation Phase (4 Months)

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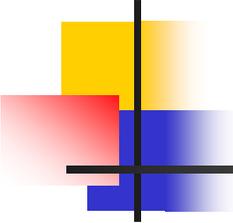
- Implemented SBI procedures in all sites
- Collected data (HLS) forms every 2 weeks
- Provided active technical assistance
- Conducted site visits
- Provided regular site specific feedback with prevalence rates and performance measures



## Sustainability Phase (4 Months)

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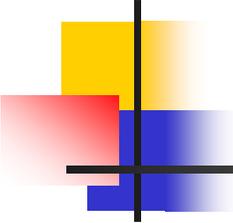
- Continued passive monitoring of SBI activities at each site
- Continued data collection
- Provided technical assistance as requested
- Completed post-implementation measures



# Results

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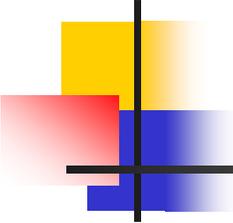
- Total of 3,502 patients screened
  - 24 Clinicians
  - 13 Specialists (non-clinicians)
  - 1 Health Educator
- 64% screened at clinician sites
- 28% screened at specialist sites
- 8% screened at health educator site



# Screening Rates by model

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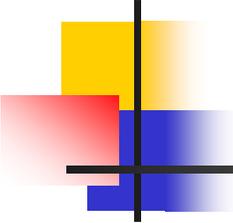
- Mean number of patients seen per week = 75 per staff member
- 82% Health Educator Model
- 25% Specialist Model
- 18% Clinician Model



# Screening Rates by Clinic Size

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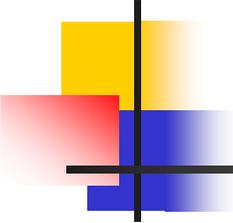
- Mean number of patients seen per week = 75 per staff member
- Smallest volume clinics (1 clinician, 1 specialist) = 90%
- Largest volume clinics ( 1 clinician, 1 specialist) = 6%



## BI Eligibles

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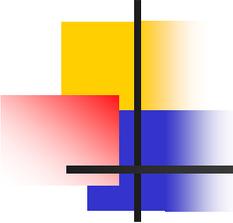
- 42% patients screened were current smokers
- 11% screened patients were at-risk drinkers
- 2/3 of eligible smokers and at-risk drinkers received BI's (no differences between models)



# Sustainability

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- Neither the clinician or specialist model sustained past the 4-month implementation phase
- 2 sites (1 clinician and 1 specialist) terminated before the sustainability phase (during the implementation phase) due to staff burn-out

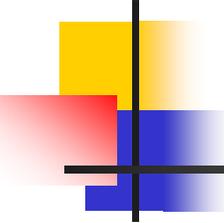


# Debriefing/Post Survey Findings

(N=38)

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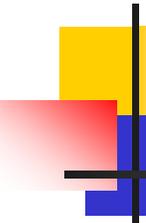
- Staff agreed philosophically with the need to conduct SBI but found it difficult to provide the service the course of a busy clinic day
- Lack of time was identified as primary barrier to successfully implementing the program
- Overall staff indicated that they had gained new skills from the experience and were more confident providing BI interventions to patients
- Reported that the program was too burdensome to conduct on a regular basis
  - Suggest limiting to preventive visits or specific times of the year (tobacco screening month)
- More comfortable conducting tobacco than alcohol intervention
- Unanimously chose the Health Educator model as most likely to succeed



# Conclusions

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- High prevalence of behavioral risk factors at FQHC's make sites ideal for SBI program implementation
- Screening is a key component
  - If screening is conducted, highly likely that BI's will be delivered
- Overall staffing at FQHC's inadequate to implement and sustain SBI activities (especially at higher-volume clinics).
- Alternative models that carve out key SBI elements to dedicated health educators may have considerable promise within a broader public health approach to behavioral risk factor reduction



## More Information on RWJ's Prescription for Health (P<sup>4</sup>H) Initiative

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- Initial findings from first round of awards published in Annals of Family Medicine
- <http://www.annfammed.org/>
  - Look for Supplement/Prescription for Health