Is moving health prevention to the mountain an effective intervention to increase access to care for exceptionally remote communities in Northern Arkansas?

A community-academic partnership helps answer that question

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Presentation Objectives

- Describe the community-academic partnership model
- Discuss how community-academic partnerships lay the foundation for in-house capacity building in program evaluation
- Identify 3 ways in which a conceptual framework is a valuable tool for program evaluation
- Apply conceptual frameworks in program evaluation for community-based health care organizations

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Partnership Overview

- Grantmaking model:
  Funding agency (J&J) partners academic institution (JHSPH) w/ grantees (OMHN) to build organizational capacity in program evaluation

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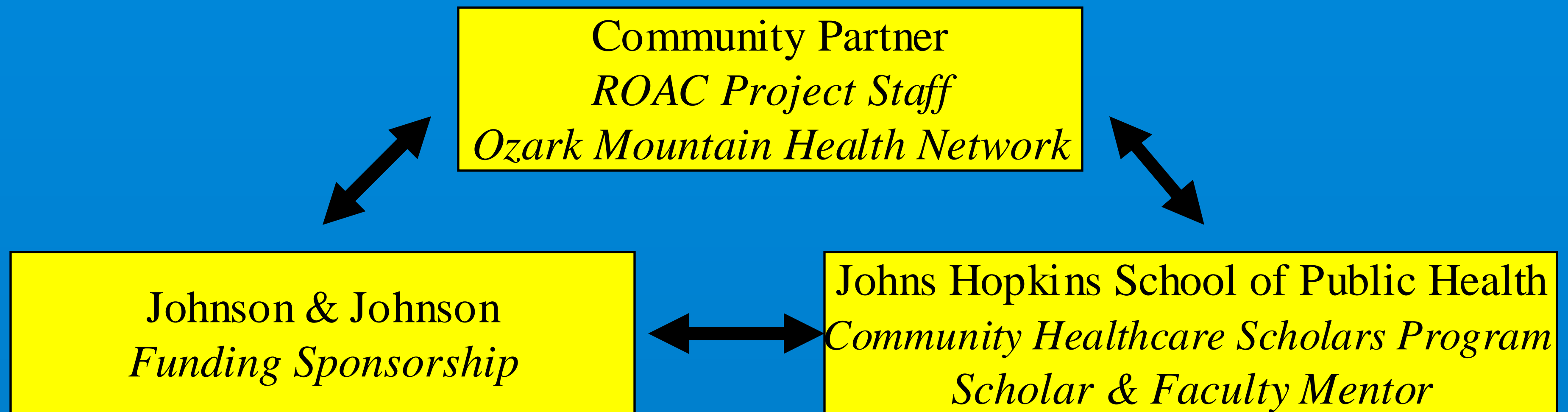
Highlighted Partnership



Partnership Goal:
Build in-house capacity and sustainable skills to conduct evaluation of this and future projects

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Ozark Mountain Health Network (OMHN)

- Collaborative health services organization
- Works with exceptionally remote, rural communities in northern Arkansas
- Works to facilitate disease prevention and health care literacy
- Reach Out and Connect (ROAC)

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Demographics – Van Buren & Searcy Counties

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- Population
  - Arkansas: 2,779,154
  - VanBuren: 16,529
  - Searcy: 7,969
- Race/Ethnicity (97% white)
- Median household income is half of the US average
- Nearly 20% of population under poverty line
- Education level lower than US average
- 20-23% >65 year of age: Higher than US average

(Map from http://www.basecampleasing.com/maps/arkansas-county-map.jpg, US Census 2000)

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Residents and Access to Care

- **20% and 32% of persons are uninsured in Van Buren and Searcy counties, respectively**
  - Compared to 13 and 17% of US and AR
  - 62% could not afford coverage
- **51% of adults in both counties did not see a doctor when needed because of cost**
- **25% had no routine check up in the past year**
- **Compounded by poor HCP/patient ratios**
  - PCPs to 1000 persons: 2.0 in AR vs 2.6 in US
  - RNs to 1000 persons: 7.3 in AR vs 8.0 in US

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(UAMS, 2006; BRFSS of Van Buren and Searcy Counties, 2004)

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Health Status of Residents

Adults (%) reporting:	US	AR	Van Buren	Searcy
High Blood Cholesterol	33.0	35.0	41.0	36.0
High Blood Pressure	24.8	30.5	37.0	34.0
Diabetes	7.0	7.0	8.0	7.0
Overweight (BMI >30)	59.0	61.0	66.0	65.0
CV-related death rate (per 100,000)	246.8	279.1	387.1	440.3

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(BRFSS of Van Buren and Searcy Counties, 2004; CDC Wonder, 2006)

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Capacity Building

- Participatory process
- Revisit the goals, objectives, indicators
- Develop a Conceptual Framework
- Compile and review data sources

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ROAC Algorithm

Health Fairs | Churches | Community Centers | Health Advocacy

→ ROAC

→ Testing (Chol, Glucose, BP)
Explanation of results and explanation of values
General health info packet

→ Normal?

- yes
  - Health Info packet
  - Medicaid/care ARKids applications given if appropriate
- no
  - Meet with RN?
    - yes
      - Health Ed counseling
      - Referral Made (PCP, pharmacy)
    - no

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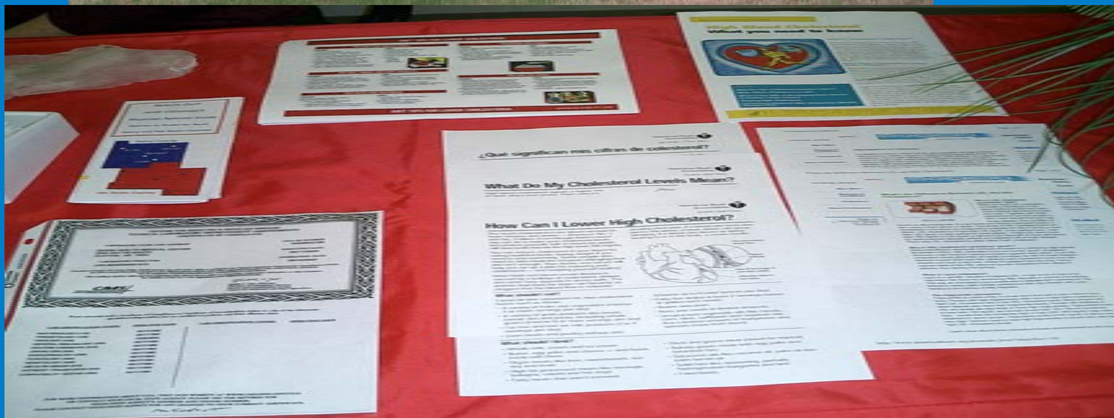
The Project:
Reach Out and Connect



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Why a Conceptual Framework?

1. Helps to identify the variables, what is being collected and what needs to be added.
2. Can serve as a roadmap for going forward
3. Can serve as a reference throughout the program to ensure accuracy of evaluation

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ROAC Conceptual Framework

Background Variables

- -Age
- -Sex
- -Race
- -Community
- -Marital status
- -Education
- -Current PCP?
- -Insurance status
- -Existing Dx
- -Tobacco use
- -Self report general health status
- -Last chk-up
- -Flu shot this year?
- -Seatbelt use

Mediating Variables

Questions regarding Health Beliefs, Knowledge, and Self-Efficacy

Program Interventions

Exposure to program intervention
- Testing
- Health counseling by RN
- Referrals made

OUTCOMES

Intermediate

Reported increased level of exercise

Reported improved nutritional intake (DM, HTN, Chol)

Impact

Cholesterol levels

BP levels

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Building on the Conceptual Framework

- **Data sources refined**
  - To reflect CF but also for ease of use in field
- **Database development training**
  - Staff were trained to create a database and enter data using Epi Info
  - Discussion of how to handle "real world" data, including missing values and streamlining multiple data sources

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Building on the Conceptual Framework

- **ROAC staff finalized the Epi Info database for monitoring and evaluating the project**
  - ROAC staff took ownership of creation and used me as a reference
  - Sent versions to me via email to check, trouble-shoot, and advise
- **Once completed, ROAC staff began entering data from health screenings**

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Summary: Community-Academic Partnerships

- Community based organizations (CBOs) are critical for bringing health access to remote communities
- CBOs depend on demonstrating a positive effect on their clients in order to sustain themselves and grow
- Community-academic partnership model
  - Combines technical expertise, local knowledge, and resources
  - Empowers CBOs to meet evaluation needs and satisfy stakeholder expectations
  - Provides invaluable field experience for academic partners

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