White Paper: Dan River Partnership for a Healthy Community Coalition Development and Capacity Evaluation

Introduction

The Dan River Partnership for a Healthy Community (DRPHC) is a community-based participatory research coalition developed to address regional obesity problems. A coalition is an organization of various community sectors utilizing collective partnerships to address targeted problems. Coalitions can function to enhance a community's ability to identify problems, mobilize efforts and may help reduce disparities by leveraging resources, including social and human capital.[1] Specifically when dealing with complex health issues, a community based participatory research framework (CBPR) is one approach to build coalitions. [2, 3] Effective CBPR initiatives integrate the knowledge gained through community-academic partnerships to further coalition efforts and execute culturally-effective interventions aimed at improving the health of communities. [2, 4, 5] Given the number of factors and resources required to develop an effective coalition, evaluating the development and community capacity of the DRPHC can reveal the extent to which the coalition is progressing, effectively implementing programs, and ultimately producing desirable and sustainable outcomes when addressing obesity in the Dan River Region. Therefore, an evaluation was developed to understand the three main stages of DRPHC coalition development (formation, implementation, and sustainability) and community capacity characteristics. The aim of this white paper is to briefly review the background of the DRPHC, methods used to conduct the evaluation, results of the evaluation, strategies and solutions the DRPHC has used to address this information, and future recommendations.

The Dan River Region is a medically underserved area that mirrors, and at times, exceeds state and national trends regarding obesity and physical inactivity. [6, 7, 8] Obesity-related adverse health outcomes (i.e. diabetes, high blood pressure, high cholesterol) also significantly exceed state averages. [7, 9, 10] In addition, three recent local comprehensive needs assessments have identified obesity as a priority health issue for the region. [11, 12, 13] These regional assessments also indicate concerns related to the capacity of community organizations to design and implement effective and sustainable solutions.

In response to these identified problems, members from the Dan River Region and researchers from Virginia Tech's Department of Human Nutrition, Foods, and Exercise launched the Dan River Partnership for a Healthy Community (DRPHC) in April 2010. At the time of this study, the DRPHC consisted of approximatley 15 organizations, 24 members, and 8 steering committee members that represented the following sectors: health care, education, local government, civic organizations, faith-based institutions, public schools, higher education institutions, local business owners, public housing, and community activism.

Methods

Evaluations were conducted between October and November of 2010. DRPHC members with an active role in initiation and development of the DRPHC were recruited. To participate in the evaluation, eligible participants needed to attend one day of the strategic planning workshop that launched the DRPHC, and attendance at a minimum of 50% of DRPHC monthly meetings

between June and November 2010. Of 24 DRPHC members, 18 were eligible. All eligible participants were contacted by telephone and email, and 12 agreed to participate. Participants represented both member levels (at-large and steering), geographic locations, and types of organizations within the DRPHC.

The evaluation was formatted into three sections that described the various stages of coalition development: a) coalition formation, b) coalition implementation, and c) coalition sustainability. Across these sections, 10 community capacity characteristics theorized to be most influential to DRPHC development were used including participation, community power, resources, sense of community, problem assessment, leadership, organizational structure, partnership, skills, and critical reflection. The definition of each dimension was described to the participants and then participants were asked to reflect on the dimension in the context of the DRPHC. Furthermore, to allow participants an opportunity to reflect on their total experience, two sections were formatted to ask participants about the historical context related to previous individual and organizational efforts to address obesity, and to reflect on current and projected efforts to address obesity.

Results

For the purpose of this white paper, only major findings are presented. Eight of the 10 community capacity characteristics identified as fundamental to the development of the DRPHC is reviewed, along with perspectives of current and future DRPHC efforts.

Characteristics of Community Capacity

1. Participation

Participation declined during early stages of coalition formation due to the slow-natured process of coalition development and program implementation. Additionally, limited continuity of representation amongst some organizations and inconsistent attendance from various DRPHC partners emerged as a consistent challenge in moving efforts forward. Despite these challenges, participants perceived there to be equitable and active participation amongst DRPHC members regarding the development of the coalition and implementation of programs and projects of efforts.

2. Community Power

Community power emerged as an important factor in DRPHC sustainability. Possessing more power to effectively address obesity due to heightened awareness and motivation was a consistent theme that emerged from participants. An important challenge that emerged was how to identify and implement methods to engage the greater community and to shift cultural norms regarding obesity, nutrition, physical activity, and overall health.

3. Resources

Resources emerged as a key factor related to DRPHC program implementation. Participants' perceived accessibility to a variety of resources within the DRPHC to enhance their ability to collectively develop and implement programs, including leveraging resources such as facilities, materials, networking, and skills. However, lack of familiarity with the resources available through various partners appeared to be a challenge for participants. Similarly lack of resources, in terms of funding to execute programs developed within the DRPHC.

4. Sense of Community

While a strong sense of community and a common interest to address obesity was identified as a key strength of the DRPHC, the geographical makeup of the region was a consistent challenge. For example, transcending interactions across state lines was the most consistent challenge perceived by participants.

5. Problem Assessment

Using the Comprehensive Participatory Planning and Evaluation process to develop causal models that identified obesity-related factors, root causes, and problems was viewed as a key strength that enhanced the coalition's ability to identify specific intervention areas during the early coalition formation stage. [14] On the contrary, participants felt more efforts were needed to act on the prioritized areas. This was largely contributed to the DRPHC being in its infancy stage of development, with limited time to begin intervention implementation.

6. Leadership

Some participants perceived equitable leadership between the community, academic partner, and steering committee as a key factor in guiding, improving, and maintaining efforts of the coalition. The steering committee and specific organizations within the steering committee, such as the Danville Regional Foundation and Virginia Tech, were often identified as important leaders within the coalition formation. Despite positive perceptions of equitable leadership among some participants, other's viewed this as a challenge and identified the need for an identifiable leader to further guide and focus the coalition's efforts.

7. Organizational Structure

Numerous participants commented positively that the organizational structure contributed to the coalition's operations and communication. On the other hand, other participants believed that the organizational structure was lacking in formality and defined structure.

8. Partnership

Partnerships were considered to be strong. Collective ideas and efforts acted as the foundation of DRPHC formation. Even though some participants had positive perceptions of the partnerships, the primary consensus was that the DRPHC needs to expand its partnerships and directly include

more members (i.e. residents) of the community and additional stakeholders from organizations or sectors not directly focused on obesity.

Historical Context

It was evident that obesity lacked attention in the Dan River Region mainly because it was considered to be a cultural norm. Additionally, poor education efforts, limited information about obesity, and limited collaborative efforts have hindered any efficient and sustainable solutions.

Current and Future DRPHC Efforts

When asked about their involvement in the DRPHC, participants consistently spoke of their enhanced confidence and motivation to address obesity. Because of shared and organized efforts, the majority of participants anticipated continued and active participation within the DRPHC. It was consistently projected that one year from now the DRPHC would accomplish established goals as well as expand objectives and areas of focus regarding obesity. Managing time to participate in efforts of DRPHC will be an ongoing challenge for the coalition's continued evolution and reaching future goals.

Strategies and Solutions

Launching this community capacity evaluation within the first six months of operation of the DRPHC has provided a thorough understanding from varying points of view and allowed for better translation into a strategic plan. Upon conclusion of this study, findings were shared informally with the DRPHC steering committee and are being used to address several identified limitations. Related to organizational structure, the DRPHC has adopted by-laws and formalized its operating and voting structure and created and adopted mission and vision statements along with a logo. Recently, the DRPHC elected their first officer positions which include a chair and co-chair which addresses the identified concern regarding leadership of the DRPHC.

In response to the identified need to improve and strengthen participation, DRPHC membership has expanded from 24 to 40 members and now includes broader community representation. Related to resources and the need to act on prioritized intervention areas, the DRPHC has received funding and launched three regional research projects including community gardens, [15] assessment of the built environment, [16] and social support programming targeting nutrition and physical activity behaviors. Additionally, several DRPHC organizations have independently received funding to launch several community programs including but not limited to community garden and education programs, school and after school physical activity and education programs, and community nutrition programs.

Future Recommendations

This evaluation captured the multilevel factors that influenced internal development and functioning of the DRPHC. Furthermore, the evaluation captured varying community stakeholder perspectives within specific areas of each capacity characteristic, as well as ways to address them. The steady progress and committed leadership and membership base illustrates the

growing capacity of the DRPHC to collectively identify problems as well as design and implement effective solutions. Additional research and evaluation efforts are needed to understand external community-level changes, such as the DRPHC's impact on obesity-related health behaviors, health outcomes, and health policies, as well continuously capture the progressive capacity changes the DRPHC experiences throughout its evolution.

References

1. Nowell, B. (2009). Profiling capacity for coordination and systems change: The relative contribution of stakeholder relationships in inter-organizational collaboratives. *American Journal of Community Psychology, 44*(3-4), 196-212.

2. Israel B. A., Eng, E., Schultz A. J., & Parker E. A. (2005). *Methods in community based participatory research for health*. San Francisco, CA: Jossey Bass.

3. Minkler M., & Wallerstein, N. (2008). *Community-based participatory research for health*: *From process to outcomes.* San Francisco, CA: Jossey Bass.

4. Granner, M. L., & Sharpe, P. A. (2004). Evaluating community coalition characteristics and functioning: A summary of measurement tools. *Health Education Research, 19*(5), 514-532.

5. Stith, S., Pruitt, I., Dees, J. E., Fronce, M., Green, N., Som, A., & Linkh, D. (2006). Implementing community-based prevention programming: A review of the literature. *Journal of Primary Prevention, 27*(6), 599-617.

6. Center for Disease Control. (2010). SMART: BRFSS city and county data: Virginia. Retrieved from http://apps.nccd.cdc.gov/brfss-smart/SelQuickViewChart.asp.

7. Virginia Department of Health. (2007). Chronic disease health indicators by health district. Retrieved from http://www.hppd.vcu.edu/documents/ChronicDiseaseHealthIndicatorsbyHealthDistrict_2007.pdf.

8. United States Department of Health and Human Services. (2010). *Medically underserved areas/populations*. Retrieved from http://muafind.hrse.gov.

9. Virginia Department of Health Division of Chronic Disease Prevention & Control. (2010). Chronic disease in Pittsylvania-Danville health district. Retrieved from http://www.vahealth.org/cdpc/documents/2010.

10. United States Census Bureau (2009). State and county quickfacts. Retrieved from http://quickfacts.census.gov/qfd/states/51/51143.html.

11. Beachler M. (2009). *Obesity prevention and reduction program development*; Report for the Danville Regional Foundation. Chapel Hill: MPB Consulting.

12. Byington, R., Naney, C., Hamilton, R., & Behringer, B. (2007). *Dan River region health assessment*. Chapel Hill, North Carolina: MDC, Inc.

13. Virginia Department of Health. (2006). *Commonwealth's health approach and mobilization plan for Inactivity, obesity, and nutrition (CHAMPION): Leading Virginia to the finish line.* Retrieved from http://www.vahealth.org/NuPAFP/Champion.

14. Zoellner, J., Motley, M., Wilkinson, M., Jackman, B., Barlow, M. L., & Hill, J. L. (2011). Engaging the Dan River Region to reduce obesity: Application of the comprehensive participatory planning and evaluation process. (In Press).

15. Zanko, A., Bonner, J., Motley, M., Chau, C., Zoellner, J.M., Hill, J.L. (2011). Exploring community gardens in a health disparate population: Findings from a mixed methods pilot study. *Annals of Behavioral Medicine, 41*(S1): B-081.

16. Chau, C. N., Luebbering, C.R., Kolivras, K. N., Zoellner, J. M., & Hill, J. L. (June 2011) Using GIS to determine environmental factors related to obesity in a health disparate region. Poster presentation at the International Society for Behavioral Nutrition and Physical Activity, Melbourne, Australia.