How to Build Community Networks and Resources Necessary for a Successful 4-H Program

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How to Build Community Networks and Resources Necessary for a Successful 4-H Program

Daniel P. Collins¹, K.S.U. Jayaratne¹, and Shannon McCollum¹

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Abstract. The purpose of this research was to explore the strategies effective in building community networks and pooling the resources necessary for laying the foundation to develop a successful county 4-H Extension program in early careers of Extension agents. We conducted this three-round Delphi study with a panel of specially selected 24 successful 4-H Extension agents. The Delphi research process led to identify seven strategies effective in building community networks and six strategies effective in building the necessary resources for the development of an effective county 4-H Extension program. We made practical recommendations based on these findings.

INTRODUCTION

Youth benefit from 4-H in every county and parish in the United States through in-school and after-school programs, school and community clubs, and 4-H camps. 4-H has a long tradition of providing school-based programming and offering clubs, camps, and special interest activities where youth discover new skills and adventures (Anderson et al., 2021). Contemporary 4-H programs provide valuable learning opportunities for youth to gain knowledge and skills related to science, technology, engineering, and math (STEM) as well as develop critical life skills such as leadership (Borden et al., 2014). The 4-H program has contributed to positive youth development across the country (Lerner, 2007). The effectiveness of these youth development programs and the success of the 4-H program mainly dependent on the county 4-H Extension agent's professional competency. Extension agents gain necessary competencies mainly through in-service training (Lakai et al., 2012) and mentoring (Benge, Steele, and Beattie, 2020; Place & Bailey, 2010).

Well-trained field Extension agents are the key to building an effective 4-H Extension program (Garst et al., 2007). In addition to well-trained staff, building community networks in a county is a critical step for the development of an effective 4-H Extension program because it enables the Extension agent to connect with the community, build partnerships, and pool resources. It may be the reason the opportunity to network has been identified as a necessary part of professional development for early-career 4-H Extension professionals (Benge, Muscato, and Beattie, 2020; Donaldson et al., 2019; Varrella et al., 2016). 4-H values partnerships and creates networks with public and private organizations in the community (National 4-H Council, 2017). Building community partnerships is an effective strategy for Extension 4-H programs to provide all youth with educational and leadership opportunities (Minnaert et al., 2020).

Building partnerships enables Extension resources to expand their reach, but in order to successfully build partnerships Extension agents need to have the necessary skills. These skills include “persistent effort, effective relationship skills, transparent communication methods, and adaptability” (Minnaert et al., 2020, p.189). Using communication technology is an effective strategy for Extension agents to expand their community network and build partnerships (Kallioranta, et al., 2006; Shuffstall et al., 2007). Additionally, using social media is an effective way for Extension agents to connect with the community (Persons, 2015). The available literature (Minnaert et al., 2020) indicates the importance of building community networks for creating an effective county 4-H program. However, there has only been very limited research into the particular strategies effective (Shuffstall et al., 2007) for building 4-H program community networks. This study aims to fill this knowledge gap.

Similar to building community networks, acquiring necessary resources is essential for building an effective County 4-H Extension program. The necessary resources...
include funding, staff, volunteers, and materials. Even with government funding support, there is a need to raise funding through private sources to support 4-H programming (Horn et al., 1998). However, acquiring the necessary resources—including volunteers—for meeting the needs of Extension clientele with diminishing public funding is a challenge (Pellien, 2016) for early career 4-H agents. Effective volunteers are an important community resource for building successful 4-H programs (Branscum et al., 2020; Franck & Donaldson, 2020). Positive youth development theory highlights the direct link between the adequacy of effective community volunteers and youth development potential (Tierney et al., 2000). This highlights the importance of having an effective volunteer base for a successful 4-H Extension program (Schinker, 2010). The review of available literature highlights the importance of having access to needed resources such as funding and volunteers for building an effective 4-H Extension program. However, there has not yet been adequate research conducted to determine the strategies effective in acquiring necessary resources for 4-H programming. The intent of this research article is to explore the strategies effective in building community networks and pooling resources necessary for building an effective county 4-H program.

**PURPOSE AND OBJECTIVES**

The purpose of this research was to determine the strategies effective in building the community networks and the resources necessary for laying the foundation to develop a successful county 4-H Extension program in the early careers of Extension agents. We implemented this study to accomplish the following two objectives:

1. Determine the strategies effective in building the community networks necessary for a successful 4-H youth Extension program.
2. Determine the strategies effective in building the community resources required for a successful 4-H Extension program.

**METHODS**

To conduct this research study, we used three rounds of the modified Delphi technique. The Delphi technique, developed by the Rand Cooperation in the 1950s, is used to build consensus among a purposively selected panel of experts about the exploring topic of interest (Hsu & Sandford 2007; Linstone & Turoff, 1975; Stufflebeam et al., 1985). Due to the consensus-building nature of the Delphi technique, it was appropriate for conducting this study. The Delphi technique uses several rounds to build consensus among the panel experts who are dispersed in a large geographic area without affecting each other's views using their feedback at each iteration (Hsu & Sanford, 2007).

Fowles (1978) emphasized the importance of paying due attention to the selection of the members for the Delphi expert panel. There are highly effective and successful 4-H Extension agents across the U.S. (Boleman et al., 2002). First, we contacted the state Extension program leaders, specialists, and district Extension directors in North Carolina and Virginia and asked them to nominate the 4-H youth development Extension agents who have very successful and effective 4-H youth development Extension programs in their respective counties to serve in the Delphi panel. We asked them to consider factors such as 4-H Extension agents having been in the county for at least 5 years and having demonstrated success at conducting impactful, positive examples of youth development programs when nominating individuals for the Delphi panel. Their exemplary 4-H programming qualified them to be selected to serving on the Delphi panel as “experts.” Based on district directors’ nominations of 4-H youth development Extension agents from these two states, we selected the top performing 24 individuals to serve on the Delphi panel.

The Qualtrics® program was used to conduct three iterations of this study in the fall of 2020. We contacted each of the panelists prior to the launch of the study to inform them about the study expectations, verify their consent to participate, and address any of their concerns. After that, the first-round survey was sent to get their responses. In the first-round survey, we asked the following questions: 1) how did you develop your 4-H community network? (i.e., target audiences, volunteer leaders, advisory groups, etc.), 2) how did you build your resource base such as financial and material support for success?

Twenty-three panelists responded to the first round and listed 55 strategies to network with the community and 50 ways to build the community resources for 4-H programming. We used the comparative analysis technique to compare and contrast the information gathered during the first round. We grouped similar concepts expressed in different wording to reduce the number of items meaningfully. This grouping was reviewed by three researchers independently to ensure the objectivity of analysis. The analysis of these first-round responses resulted in a unique list of nine strategies to network with the community and nine ways to build the community resources. These identified nine strategies to network with the community and nine ways to build the community resources in the first round were used to develop the second-round survey.

In the second round, we listed these community networking strategies and resource-building strategies and asked the panel members to rate the level of importance of each of the strategies in contributing to a very effective
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youth development Extension program in a county on a
five-point Likert scale (1=not at all important, 2=slightly
important, 3=moderately important, 4=very important, and
5=extremely important). In addition to that, respondents
were asked to list any strategy not included in the list and
make any changes needed to the listed items as clarification.

Of the 24 panel members, 21 responded to the second-
round survey comprising an 88% response rate. We defined
the consensus a priori as 2/3 of the panel identifying
extremely important or very important regarding community
networking and resource-building strategies (Warner, 2015).
The second-round data analysis led to consensus building
on seven out of nine community networking strategies and
seven out of nine community resource-building strategies. In
addition to that, the expert panel also listed one new strategy
to build community resources. The second-round findings
were used to develop the third and final round survey.

In the final round, we listed the expert panel agreed
on community network building seven strategies and
community resource building seven strategies with the new
resource strategy identified in the second round. We listed
community networking seven strategies and community
resource building eight strategies alphabetically and asked
the panel members to rate their level of agreement with each
strategy in terms of its contribution to building very effective
youth development extension programs in a county on a
five-point Likert scale (1=strongly disagree, 2=somewhat
disagree, 3=neither agree nor disagree, 4=somewhat agree,
and 5=strongly agree).

Nineteen panel members responded to the third-
round survey resulting 79% response rate. We defined the
consensus a priori as 2/3 of the panel rating somewhat agree
or strongly agree and analyzed the data to identify the items
that received 2/3 or more consent from the expert panel.
The third-round findings helped create consensus on seven
strategies for community network building and six strategies
for community resource building six strategies that are
important for developing an effective county 4-H Extension
program.

RESULTS

THE STRATEGIES EFFECTIVE FOR
BUILDING COMMUNITY NETWORKS

The three-step Delphi research process led to identify seven
strategies effective for building community networks for the
development of effective county 4-H Extension programs as
presented in Table 1. The highest ranked four networking
strategies with 94% level agreement of the Delphi panel
members are 1) having supportive and committed volunteers,
2) making connections through community activities and
engagement with organizations, 3) making connections with
the community through need-based programming, and 4)
Marketing programs to potential audiences. The Delphi panel
identified the next three strategies with an 83–89% level of
agreement including 5) talking to 4-H program supporters,
orGANizations, and alumni groups, 6) using available contacts
such as office staff and advisory members, and 7) making
connections through newsletters, social, and mass media.

THE STRATEGIES EFFECTIVE FOR BUILDING
COMMUNITY RESOURCES

We identified six strategies effective in building community
resources through the three-step Delphi process with 72–
94% agreement of panel members as listed in Table 2. These
effective strategies are 1) communicating 4-H program
needs with potential funders and local businesses, 2)
communicating 4-H program impacts with funders, 3) using
professional and personal connections by telling 4-H success
stories, 4) writing and applying for potential grants, 5) trying
various fundraising events such as community festivals, food
booths, etc. and 6) words of wisdom and advice through
personal acknowledgment of funding support to sustain the
donor support.

CONCLUSIONS, RECOMMENDATIONS,
AND IMPLICATIONS

After identifying these community networking and
resource-building strategies by the Delphi panel, we now
make conclusions and provide recommendations for each
strategy by citing related literature reaffirming our findings
for Extension 4-H professionals to consider for laying the
foundation to develop a successful county 4-H Extension
program. Community resources and community networking
are essential for building an effective successful 4-H program
in a county. New Extension agents will have to go through
a steep learning curve for learning how to develop needed
community networks and pool community resources. The
findings of this Delphi study provide strategies effective in
building community networks and community resources
for laying the foundation to develop a successful county 4-H
program. This is the practical implication of this research.

STRATEGIES FOR BUILDING COMMUNITY NETWORKS

A panel of successful 4-H Extension agents identified seven
strategies effective in building community networks necessary
for the development of effective 4-H county Extension
programs. Having supportive and committed volunteers is the
first effective strategy for building needed networks with the
community for 4-H Extension programming (Hensley et al.,
2020). When there are supportive and committed volunteers,
Extension agents will be able to reach the community
effectively through them (Grant et al., 2020). Therefore, new
4-H Extension agents should pay due attention to identify
Finding individuals with characteristics similar to the existing volunteers serving in the organization is effective in recruiting volunteers (Smith & Finley, 2004; Wymer et al., 1996). The vast majority of 4-H volunteers got involved in Extension because of their children. Therefore, it is better to start recruiting potential volunteers from this group (Smith & Finley, 2004). Making connections through community activities and engagement with organizations is the second effective strategy for networking with the community. Fostering community partnerships lead to make work easier, transparent, representative of community interests, effective, and impactful (Shakesprere et al., 2021). Available literature supports the notion of building community partnerships for effective Extension engagement (Bender & Bull, 2007; Mincemoyer et al., 2004; Minnaert et al., 2020). For instance, engagement with schools in the county is an effective strategy for expanding 4-H Extension education programs to schoolchildren and making connections with the community through students and teachers. “Adopting and fostering four

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### Table 1. The Strategies Effective for Building Community Networks for the Development of Successful 4-H Extension Programs

<table>
<thead>
<tr>
<th>Community Network Building Strategy</th>
<th>Representative Quote for the Strategy</th>
<th>Percentage of the Respondents Strongly Agreed or Somewhat Agreed</th>
</tr>
</thead>
<tbody>
<tr>
<td>Having supportive and committed volunteers</td>
<td>“I did my best to support those folks who were already volunteering and doing the work.”</td>
<td>94%</td>
</tr>
<tr>
<td>Making connections through community activities and engagement with organizations</td>
<td>“Work closely with community partners, serve on boards within the community, actively involve myself in things outside of 4-H to network then once relationships were formed pulled those people in to assist in my programming efforts. Being present. I spent a lot of hours going to meetings and community events, volunteering on boards, introducing myself, asking key folks to introduce me to other key folks in the community.”</td>
<td>94%</td>
</tr>
<tr>
<td>Making connections with the community through need-based programming</td>
<td>“I did needs assessments with the mailing lists we had when I came. We work with ages 5 to 18 so I try to have a program for each age group so that we are working with all youth and I try to offer programs for the whole county but then try to be sure we have community clubs in all areas of the county so we can reach even more youth.”</td>
<td>94%</td>
</tr>
<tr>
<td>Marketing programs to potential audiences</td>
<td>“Intentional marketing strategies to recruit new volunteers, and referrals from school personnel and other youth community partners. I sent letters/emails and visited with organizations and leaders in the county to introduce myself and all that 4-H had to offer. Went to many fairs, events to set up to try to recruit new volunteers and youth.”</td>
<td>94%</td>
</tr>
<tr>
<td>Talking to 4-H program supporters, organizations, and alumni group</td>
<td>“I relied heavily on our 4-H All-Star (alumni group) for advice and leadership. I also reached out to parents of active 4-H members. Some of the most involved parents and volunteers became the base of the advisory group, but we also included school personnel, social services personnel and other key community members not associated with 4-H.”</td>
<td>89%</td>
</tr>
<tr>
<td>Using available contacts such as office staff advisory members</td>
<td>“I started by asking in my office for names and contact information for people I should reach out to. At the end of every conversation with a new contact, I would ask for the names of a couple more people they thought I should reach out to.”</td>
<td>89%</td>
</tr>
<tr>
<td>Making connections through newsletters, social, and mass media</td>
<td>“Developed newsletters that were mailed to stakeholders and kept the 4-H name in the local newspaper through press releases and pictures. I also made personal contact with the local newspaper. Incorporating social media early on, I also used some fliers and business cards to give people whom I met, but the longer I stayed, the stronger that network became.”</td>
<td>83%</td>
</tr>
</tbody>
</table>
Table 2. The Strategies Effective for Building Community Resources for the Development of Successful 4-H Extension Programs

<table>
<thead>
<tr>
<th>Community Resource Building Strategy</th>
<th>Representative Quote for the Strategy</th>
<th>Percentage of the Respondents Strongly Agreed or Somewhat Agreed</th>
</tr>
</thead>
<tbody>
<tr>
<td>Communicating 4-H program needs with potential funders and local businesses</td>
<td>“I found that local businesses and groups were very supportive, so I just had to figure out our needs and ask for support.”</td>
<td>94%</td>
</tr>
<tr>
<td>Communicating 4-H program impacts with funders</td>
<td>“Writing excellent impacts that have valid evaluation data and showing how the programs I’m delivering are relevant and impacting to my community. Partners are willing to contribute when they see value in what you are doing and believe that their additional support can make a difference.”</td>
<td>94%</td>
</tr>
<tr>
<td>Using professional and personal connections by telling 4-H success stories</td>
<td>“By telling our story. I use photos, newspaper articles, social media, and community presentations to let people know what 4-H is doing. When they see success, they want to jump on board and be part of that, too.”</td>
<td>94%</td>
</tr>
<tr>
<td>Writing and applying for potential grants</td>
<td>“I applied for lots of grants to support specific programs. Early on, I applied for and received a couple of grants to help me start a couple of activities.”</td>
<td>83%</td>
</tr>
<tr>
<td>Trying various fundraising events such as community festivals, food booths, etc.</td>
<td>“I tried various local fundraisers like yard sales and food booths at community festivals.”</td>
<td>72%</td>
</tr>
<tr>
<td>Words of wisdom and advice through personal acknowledgment of funding support to sustain the donor support.</td>
<td>“I also still very much believe in the power of a handwritten thank you note, so I send those to donors, volunteers, and kids. They tell me it makes them feel appreciated.”</td>
<td>72%</td>
</tr>
</tbody>
</table>

core principles of understanding, transparency, trust, and equity are essential to creating a sustainable partnership” (Shakespere et al., 2021, p. 2). This strategy highlights the significance of engagement in community activities and events for Extension agents to develop new connections with the community.

Reaching the community through need-based programming is the third effective strategy for community networking because community members tend to participate in educational programs when they see how programs meet their needs. Community input is needed to develop and deliver relevant and well-attended programming (Bovitz et al., 2018). Available literature supports the effectiveness of need-based or demand-driven Extension programming as an effective strategy for community networking and engagement (Suvedi & Kaplowitz, 2016). New Extension agents should conduct needs assessments with the community and plan to deliver need-based educational programs to engage and network with the community.

Marketing programs to potential audiences in the community is the fourth effective strategy to network with the community. Even if Extension agents develop need-based educational programs, if those programs are not marketed to the potential audience, the audience will not be aware of the programs. Therefore, it is very important to market Extension programs to potential participants to make them aware of available educational opportunities. Program marketing enables Extension agents to broaden their clientele base (Carlson, 1990) and expand the community network (Lunday et al., 2021). Marketing contributes to increased enrollment in Extension programs (Diem, 2008) which in turn leads to expanding the programming network.

Talking to 4-H program supporters, organizations, and alumni groups is the fifth strategy to network with the community. Those who are already connected and have a positive experience with 4-H programs are effective community members to connect with the community and help expand the community network. Available literature (Merten et al., 2014) indicates that 4-H alumni tend to volunteer in 4-H. Facebook and text messaging are preferred communication methods of young 4-H alumni (Zammit, 2016). 4-H Extension agents should use these communication channels and explore alumni groups and the current supporters of 4-H in the county to expand the
community network through them because of their unique ability to build a rapport with the others in the community.

Using available contacts such as the office staff and Extension advisory members is the sixth effective strategy to network because they have already established connections with the community and Extension. Available literature also emphasizes the possibility of using advisory committee members (Martin, 2018; O’Neill, 2010) and the office staff to network with the community. Their recommendations and connections are important to expand the community network of Extension agents. Therefore, it is important for new Extension agents to use already established community linkages of office staff and advisory group members when building their community network.

Making connections through newsletters, social, and mass media is the seventh effective in building the community network necessary for Extension programming (Inefuku & Franz, 2015). The Extension uses newsletters and mass media as traditional methods of communicating with clientele. Social media is the current trend and is effective in reaching a vast audience and expanding the community network efficiently (Christensen et al., 2015). New 4-H Extension agents should use these methods to build community networks for facilitating their educational programs.

STRATEGIES FOR BUILDING RESOURCES
A Delphi panel of successful 4-H Extension agents identified six strategies effective for building community resources necessary for 4-H Extension programming. Communicating program needs with potential funders and local businesses is an effective strategy for building necessary resources for Extension programming (Angima et al., 2014; Hughes & Ledbetter, 2009). Generally, local businesses support 4-H Extension programming and New Extension agents should plan to utilize this community resource for funding 4-H programs.

Communicating 4-H program impacts with funders is another strategy effective in building resources (Hogan, 1994). It is essential for Extension to demonstrate program impact to stakeholders for gaining their support (Branscum et al., 2020; O’Neill, 1998; Workman & Scheer, 2012). When potential funders see the impacts made by current 4-H programs, they may tend to provide needed resources to a worthy cause of 4-H programming. This strategy highlights the need of evaluating Extension programs for impacts and communicating results with funding partners (Pellien, 2016). Extension agents should learn to document and communicate program outcomes with potential funders.

Using professional and personal connections by telling 4-H success stories is another strategy to develop needed resources. When people hear about the success stories of 4-H programming, they want to contribute and are intrinsically motivated to volunteer for 4-H (Payne, 2011). This emphasizes the need for learning how to write 4-H success stories and share them with potential donors for building the resource base needed for county 4-H programming.

Writing and applying for potential grants is another strategy effective in developing needed resources for 4-H programming. Grants help 4-H expand access to needed resources (Turner, 2022). The use of grant funding for Extension programming is an important practice and it stresses the need to identify of potential grant funders and learn how to write grant proposals to support Extension programs (Hughes & Ledbetter, 2009). New 4-H Extension agents should learn to identify potential funding sources and write grant proposals as an effective strategy for building resources. Organizing various fundraising events such as community festivals and food booths is another strategy to raise funds for 4-H programs. Literature (Gillespie, 2006; Maine Cooperative Extension, nd; Murza, 2014) indicates that 4-H Extension agents can use food booths at community festivals such as county fairs for fundraising. It is important to acknowledge and appreciate donors for their continuous support of 4-H programming. This process can establish lasting collaborative support of funding for selected 4-H programs. The available literature (Huff & Pleskac, 2012) highlights the significance of relationship building of 4-H Extension staff with funders when strengthening local programs. We recommend that onboarding and professional development programs focused on early-career 4-H Extension agents should pay attention to the above-discussed strategies to help lay the foundation for networking with the community and building resources. The implications of a tailored training process would help early-career 4-H agents develop programmatic needs and set benchmarks to build their community connections and resource base for successful 4-H programming.

REFERENCES
Building Community Networks and Resources


Maine Cooperative Extension. (nd). *4-H food booth at the Blue Hill fair*. https://extension.umaine.edu/hancock/4h/foodbooth/


