



April 2010
Volume 48 Number 2
Article Number 2RIB1

[Return to Current Issue](#)

Relationship Between Participation in 4-H and Community Leadership in Rural Montana

Allison Flynn

4-H/Youth Development Extension Educator
University of Wyoming
Sheridan, Wyoming
aflynn.montana@gmail.com

Martin Frick

Professor
Montana State University
Bozeman, Montana
uadmf@montana.edu

Douglas Steele

Vice-Provost and Director of Extension
Montana State University
Bozeman, Montana
dsteele@montana.edu

Abstract: Studies on the impact of 4-H on former members generally use alumni as one cohort. In rural states, such as Montana, it is important to understand the impact of 4-H on alumni in these rural areas and the role 4-H plays in community involvement. The study reported here sought to determine the perception of current community leaders in rural Montana and the relationship between development of leadership skills and participation in 4-H. The study found that 4-H continues to influence rural community leaders in Montana, although it plays a modest role in influencing community involvement in all areas except agriculture groups.

Introduction and Conceptual Framework

There has been considerable research concentrating on the impact of 4-H on youth. Research has shown that participation in 4-H leadership activities has a positive relationship with youth life skills development (Severs & Dormody, 1995), 4-H youth are more likely to be involved in community service than non-4-H youth (Parrish & Igo, 2006), and 4-H youth have higher skill development in working with groups, communication, and decision making than non-4-H youth (Boyd, Herring, & Briers, 1992). Research in Montana concluded that 4-H youth were less likely to participate in "high risk" activities and more likely to do better in school than non-4-H youth (Astroth & Hayes, 2002). These studies showed the impact of 4-H on youth, but didn't answer the question of whether these skills and attitudes carry on into adulthood.

There have been several studies examining 4-H alumni. A study at Pennsylvania State University concluded that 4-H alumni view their 4-H experiences as positive and that 4-H continues to influence them (Radhakrishna,

2005). Studies found that 4-H involvement as a youth has a major impact on civic engagement as an adult (Pennington & Edwards, 2006), and the 4-H club experience does affect the development of life skills of 4-H alumni (Fox, Schroeder, & Lodl, 2003).

Montana is primarily a rural state with few urbanized areas. In many rural areas, 4-H remains one of the primary youth programs outside of the formal education system. Most of the research that concentrated on 4-H alumni looked at the alumni as one cohort and did not distinguish between rural and urban populations. Community dynamics in rural communities are often different from those in urbanized areas. As a result, participation in 4-H may influence rural communities and former 4-H members differently in rural areas. A study of the relationship between participation in 4-H and community leadership in rural Indiana found one of the top factors influencing the success of rural community leaders was 4-H (Tharp, 1998). In rural states, such as Montana, understanding how 4-H influences community leadership can help shape future 4-H civic engagement initiatives.

Purpose and Objectives

The purpose of the study reported here was to determine the perception of current community leaders in rural Montana and the relationship between the development of their leadership skills and participation in 4-H as a youth. The objectives were to:

1. Describe rural community leaders in regards to demographics and participation in community activities;
2. Identify which factors rural community leaders recognize as contributing the most to their success;
3. Determine the level of involvement of rural community leaders who participated in the 4-H program as a youth;
4. Examine the perceptions of leadership skills acquired through 4-H of the rural community leaders who participated in 4-H as a youth;
5. Compare the level of involvement in selected activities of former 4-H members and non-members.

Methodology

The study employed quantitative research methods that measured a purposeful sample. The population consisted of community leaders in rural Montana counties with a population of 15,000 or less. Using 2000 census data, 44 of Montana's 56 counties were identified as having the targeted population (U.S. Census Bureau, 2000). Because some counties share Extension offices, 39 county offices were contacted to identify 10 individuals in the county who were considered community leaders. A questionnaire was mailed to each community leader identified by the county agents.

The questionnaire was modified from a study conducted by Tharp (1998). The instrument developed by Tharp was adapted from a study focusing on vocational agriculture and Future Farmers of America conducted by Brannon (1988). The first part of the questionnaire focused on demographics and level of involvement in community activities. The questionnaire asked respondents to rate the factors that contributed most to their success. The contributions were ranked on a Likert-type scale, with one representing no contribution to five

representing the most contribution. The first section ended by asking if respondents were enrolled in 4-H.

Part II was only completed by respondents who were enrolled in 4-H as youth. The section asked the length of 4-H involvement, highest office held and participation in 4-H activities. Respondents indicated their perceptions of 4-H experiences on a Likert-type scale, from one representing no contribution in their adult life to five representing a great contribution.

Findings

A total of 25 Extension offices responded with community leaders, for a sample of 256 rural community leaders. In combined county offices, some county agents provided more than 10 leaders, resulting in the odd number of leaders. There were a total of 196 respondents, for a response rate of 75.4%.

The mean age of respondents was 54.8 years (SD = 10.7). Selected characteristics of the sample population are described in Table 1. Nearly 62% of respondents were male, 96% were Caucasian, 45% had a college degree and 34% were employed full time in agriculture.

Table 1.
Selected Characteristics of 4-H Alumni (n = 193)

Characteristics	n	%
Gender		
Male	119	61.3
Female	74	38.1
Ethnicity		
Asian	1	.5
Caucasian	185	95.9
American Indian	2	1.0
Other	1	.5
Non Respondents	4	2.1
Education		
High School	25	13.0
Some College	44	22.8
Bachelor's Degree	87	45.1
Master Degree	19	9.8
PhD or Post-Masters	13	6.7
Other	5	2.6
Occupational Status		

Full Time — Agriculture	66	34.2
Full Time — Business	37	19.2
Full Time — Education	17	8.8
Full Time — Government	22	11.4
Full Time — Communications	6	3.1
Full Time — Industry	3	1.6
Full Time — Other	12	6.2
Part Time	9	4.7
Retired	19	9.8
Unemployed and Other	2	1.0

Sixty-five percent of respondents (n = 126) indicated they pursued agricultural interests outside of their regular line of work. On average, 25% (SD = 24.9) of their income was attributed to agricultural activities.

Table 2 shows the degree of participation in community activities of all respondents. Over half of the respondents were involved in Civic, Luncheon, or Service Clubs (64.9%); Church Groups (64.4%); Community Affairs Organizations (59.3%); and Agricultural Groups (51.0%).

Table 2.

Degree of Participation in Community Activities of all Respondents (n = 193)

Activity	Participant or Member		Committee Member		Officer	
	Freq.	%	Freq.	%	Freq.	%
Civic, Luncheon or Service Club	126	64.9	88	45.4	65	33.5
Church Groups	125	64.4	64	33.0	49	25.3
Community Affairs Organization	115	59.3	62	32.0	48	24.7
Agricultural Groups	99	51.0	47	24.2	32	16.5
Educational Groups	88	45.4	39	20.1	29	14.9
Chamber of Commerce	85	43.8	36	18.6	16	8.2
Local or County Political Offices or Organizations	82	42.3	53	27.3	58	29.9
School Organizations	49	25.3	29	14.9	18	9.3

Shown in Table 3 are the factors that the respondents indicated contributed most to their success as a community

leader. The top three factors were Learned from Others (M = 4.14, SD = .77), Self Taught (M = 3.78, SD = .89) and College (M = 3.42, SD = 1.42).

Table 3.
Factors Contributing to the Success of all Respondents (n = 193)

Factor	No Response	None 1	Little 2	Some 3	Much 4	Great 5	Mean	SD
Learned from Others	4	2	1	30	92	64	4.14	.77
Self Taught	9	7	2	49	92	34	3.78	.89
College	4	36	9	34	60	50	3.42	1.42
High School	5	6	24	74	64	20	3.36	.95
Professional Organizations	10	30	9	56	58	30	3.27	1.27
4-H Club	5	60	8	42	49	29	2.89	1.48
Other	125	38	3	7	20	68	2.57	1.84
Other Youth Organizations	39	67	8	33	34	12	2.45	1.43
Agricultural Education/FFA	11	104	7	26	29	16	2.15	1.46
Vocational-Technical School	20	136	5	13	13	6	1.54	1.13
Military	16	143	5	7	14	8	1.53	1.16

Data from respondents who were enrolled in 4-H were analyzed separately. Table 4 shows the responses that contributed the most to the success of 4-H alumni. The top three responses of 4-H alumni were Learned from Others (M = 4.10, SD = .76), 4-H Club (M = 3.81, SD = .95) and Self Taught (M = 3.70, SD = .92)

Table 4.
Factors Contributing to the Success of 4-H Alumni (n = 114)

Factor	No Response	None 1	Little 2	Some 3	Much 4	Great 5	Mean	SD
Learned From Others	2	1	1	18	58	34	4.10	.76
4-H Club	1	2	7	30	45	29	3.81	.95
Self Taught	5	5	1	34	51	18	3.70	.92
College	3	18	8	15	38	32	3.52	1.40

High School	3	5	14	43	37	12	3.33	.98
Professional Organizations	9	14	5	39	32	15	3.28	1.18
Other	80	17	0	2	4	11	2.76	1.86
Other Youth Organizations	26	33	5	18	26	6	2.63	1.42
Agricultural Education/FFA	7	53	7	15	20	12	2.36	1.15
Vocational-Technical School	10	77	3	8	12	4	1.68	1.24
Military	14	81	2	4	8	5	1.54	1.19

Almost 60% of respondents indicated they were enrolled in 4-H as youth. Fifty percent of those enrolled in 4-H were enrolled in the community in which they currently reside. Table 5 provides selected characteristics of 4-H alumni respondents. Twenty-five percent were enrolled in 4-H for 10 years, and 52.6% indicated the highest office they held was president.

Table 5.
Selected Characteristics of 4-H Alumni (n = 114)

Characteristics	N	%
Years in 4-H		
Less than 1 year	1	.9
1-2 years	11	9.7
3-4 years	21	18.4
5-6 years	26	22.8
7-8 years	12	10.5
9-10 years	40	35.0
Greater than 10 years	3	1.5
Highest Office Held		
Did Not Hold Office	31	27.2
President	60	52.6
Vice-President	6	5.3
Secretary	9	7.9
Treasurer	3	2.6

Other	3	2.6
Non Respondents	2	1.8

Respondents were given a list of activities and asked to indicate which activities they had participated in as a 4-H youth. The five most popular activities were fairs (83.2%), demonstrations (83.2%), judging contests (72.6%), holding office (67.3%), and committee member (67.3%).

4-H alumni were asked their perceptions of 4-H experiences and to rank them according to the contribution this experience had in the respondent's adult life. The top three experiences that had the greatest contribution were "taught you how to participate in the conduct of meetings" ($M = 3.89$, $SD = .90$), "influenced you to participate in community activities" ($M = 3.86$, $SD = .94$), and "helped you in developing leadership skills" ($M = 3.73$, $SD = .94$). Table 6 shows the responses of perception of 4-H experiences.

Table 6.
Perceptions of 4-H Experiences (n = 114)

Factor	No Response	None 1	Little 2	Some 3	Much 4	Great 5	Mean	SD
Taught you how to participate in the conduct of meetings	1	2	8	16	61	26	3.89	.90
Influenced you to participate in community activities	2	2	7	26	47	30	3.86	.94
Helped you in developing leadership skills	2	4	5	29	53	21	3.73	.94
Prepared you in assuming leadership roles	1	4	8	31	46	24	3.69	1.00
Involved you in planning club activities	1	4	5	36	47	21	3.67	.95
Helped you become a more effective community leader	1	4	6	37	46	20	3.64	.95
Has been of value in your career	2	4	12	29	42	25	3.64	1.06
Influenced your decision to become a leader	2	5	4	41	40	22	3.63	.99

Gave you the opportunity to lead others	1	5	8	44	36	20	3.51	1.01
Helps you in your present occupation	2	7	15	33	38	19	3.42	1.11
Helped you in obtaining a job	1	18	27	37	22	9	2.80	1.17

To determine if participation in 4-H as a youth influenced community involvement as an adult, each respondent was scored on his or her participation in community activities. Respondents received one point if they participated in a community group, two points if they were a committee member, and four points if they were an officer.

Scores were chosen to reflect the leadership obligations of the various positions. For each activity, a maximum of seven points could be achieved, and the minimum was zero. A composite score was established by adding the individual scores for each community activity to determine overall community involvement, with a range from 0 to 56. An independent samples *t*-test was performed on each activity and composite score to compare 4-H alumni and those who never participated to determine if there were any significant differences between group means. A significant difference between group means would be an indicator that participation in 4-H influenced their involvement in a selected community activity or total community involvement.

There were eight categories of community involvement, as shown in Table 7 with the results from the *t*-tests. When analyzing Agricultural Groups, *t*-tests revealed a significant difference in group means between those who participated in 4-H ($M = 2.25$, $SD = 2.70$) and those who did not ($M = 1.34$, $SD = 2.13$), $t(174) = 2.355$, $p = .002$. The composite score *t*-test did not reveal any significant differences, $t(191) = .381$, $p = .713$.

Table 7.
t-scores of Community Involvement Categories and Composite Score

Category	Sig.	df	<i>t</i>
Civic, Luncheon or Service Groups	.599	178	.707
Chamber of Commerce	.985	176	-.448
Community Affairs Organization	.724	170	-.753
School Organization	.214	161	.643
Local or County Political Offices or Organizations	.060	176	-1.107
Church Groups	.424	173	.273
Agricultural Groups*	.002	174	2.355
Educational Groups	.830	163	.768
Composite Community Involvement Score**	.713	191	.381

* t-test revealed that participates in 4-H had a statistically significant higher mean score than non-participants.
** Minimum composite score equaled 1. Maximum score equaled 38.

Discussion and Implications

Several conclusions can be drawn from this research. The factors that contributed most to the success of community leaders were "learning from others," "self education," and "college," which are factors that occur mainly during adult life. When analyzing responses from 4-H alumni, participation in 4-H became the second most important factor. Thus it shows that participation in 4-H as a youth can contribute to the success of an individual in adulthood.

Analyzing perceptions of 4-H experiences helped identify the skills that had the greatest impact on 4-H alumni. The experiences that had the greatest contribution to 4-H alumni were related to conducting meetings, developing leadership skills, and participating in community activities. Leadership skills and community service are two of the core values of the 4-H program and show the 4-H program is successfully building those skills in youth, as well as having a lasting impact in adults. The 4-H program should continue to work at building leadership life skills and place an emphasis on service learning.

The item that had a considerably lower mean value and the least impact on 4-H alumni was helping former 4-H youth obtain a job. That indicated that 4-H should place more emphasis on teaching job skills, such as resume building and interview skills. In rural areas where 4-H is a leading youth organization, it is increasingly important for 4-H volunteers and educators to assist with the development of job preparation skills.

When analyzing if 4-H influences community leadership, the only type of community group where a significant difference was found was agriculture groups. The findings show that those involved in 4-H have a strong attachment to leadership in agriculture. These findings are consistent with the results of Tharp (1998). The mean age of 4-H alumni was 53.2, and 50% were enrolled in their present community, which means that on average respondents participated in 4-H in the 1960s and early 1970s. This was during the time when 4-H was trying to have an impact on urban areas and develop a more well rounded program.

Montana, being a more rural state, may not have felt as much motivation to expand into urbanized areas. Montana still had the feel of a "traditional" 4-H program, with an emphasis on agriculture and home economics. As a result, most of the respondents were probably enrolled in agricultural-related projects and achieved leadership skills in those areas. This may have influenced their decisions to participate in community agriculture groups as adults.

It also needs to be acknowledged that most of the county agents who were surveyed for community leaders had an agriculture focus in their position. As a result, they may have identified most with agriculture professionals and 4-H volunteers, although this may not have always been true. Nothing was assumed about the backgrounds of those individuals, so the study should accurately reflect the relationships between 4-H and community leaders.

It would be valuable to continue surveying rural community leaders as the population changes. With these changes, there could potentially be an increase of community leaders who participated in 4-H, with a larger variety of projects and more 4-H influence in urbanized areas. It is recommended that this research be repeated every 5 years in Montana to determine if there have been any changes in community involvement and how 4-H impacts this involvement.

The research reported here showed that 4-H continues to have an impact on alumni even into adulthood. Similar research should be conducted in other states to determine the influence of 4-H on community leaders in rural and urban areas. The 4-H program is constantly adapting to the needs of society. Therefore, it is important to continue to monitor the successes of 4-H and how they change over time with societal trends that all affect youth differently.

It is recognized that the data collected from respondents cannot be generalized to any population on a statistical basis. However, the findings may have practical implications for State Extension faculty and administration, and should direct researchers to further examine the impact of 4-H experiences on adults.

References

Astroth, K. A., & Haynes, G. W. (2002, August). More than cows & cooking: New research shows impact of 4-H. *Journal of Extension* [On-line], 40 (4) Article 4FEA6. Available at: <http://www.joe.org/joe/2002august/a6.php>

Boyd, B. L., Herring, D. R., & Briers, G. E. (1992). Developing life skills in youth. *Journal of Extension* [On-line], 30 (4) Article 4FEA4. Available at: <http://www.joe.org/joe/1992winter/a4.php>

Brannon, T. L. (1988, May). *Impact of vocational agriculture/FFA on community leadership in Oklahoma*. Unpublished doctoral dissertation, Oklahoma State University, Stillwater.

Fox, J., Schroeder, D., & Lodl, K. (2003). Life skill development through 4-H clubs: The perspective of 4-H alumni. *Journal of Extension* [On-line], 41 (6) Article 6RIB2. Available at: <http://www.joe.org/joe/2003december/rb2.php>

Parrish, R. E., & Igo, C. G. (2006). *Community involvement: Does 4-H make a difference?* Proceedings of the Annual Western Region Agricultural Education Research Conference, Boise, ID. 25, 51-61.

Pennington, P., & Edwards, M. C. (2006). Former 4-H key club members' perceptions of the impact of "giving" life skills preparation on their civic engagement. *Journal of Extension* [On-line], 44 (1) Article 1FEA7. Available at: <http://www.joe.org/joe/2006february/a7.php>

Radhakrishna, R. B. (2005). *Influence of 4-H program on former 4-H members' career and life experiences*. Proceedings of American Association of Agriculture Education Research Conference, San Antonio, TX. 32, 77-87.

Severs, B. S., & Dormody, T. J. (1995). Leadership life skills development: perceptions of senior 4-H youth. *Journal of Extension* [On-line], 33 (4) Article 4RIB1. Available at: <http://www.joe.org/joe/1995august/rb1.php>

Tharp, A. (1998, August). *The relationship between participation in 4-H and community leadership in rural Indiana*. Unpublished master's thesis. Purdue University, West Lafayette, Indiana

U.S. Census Bureau. (2000). *Geographic information table: Montana by county*. Retrieved May 12, 2009 from: http://factfinder.census.gov/servlet/GCTTable?_bm=n&_lang=en&_mt_name=DEC_2000_PL_U_GCTPL_ST2&format=ST-2&box_head_nbr=GCT-PL&ds_name=DEC_2000_PL_U&geo_id=04000US30.

Copyright © by Extension Journal, Inc. ISSN 1077-5315. Articles appearing in the Journal become the property of the Journal. Single copies of articles may be reproduced in electronic or print form for use in educational or training activities. Inclusion of articles in other publications, electronic sources, or systematic large-scale

distribution may be done only with prior electronic or written permission of the *Journal Editorial Office*, joe-ed@joe.org.

If you have difficulties viewing or printing this page, please contact *JOE Technical Support*.