Editor’s Comments:

Our Summer Issue brings readers an overview of several innovative youth development programs and evaluation techniques. Learn about the process undertaken to develop a program theory model that can be tested through a large scale evaluation in “What’s Going On? Developing Program Theory for Evaluation.” Teen communication styles, parenting styles, community engagement and techniques to teach financial management to youth are also addressed in the Summer Issue.

Manuscripts for the Spring and Fall Issues are now being accepted. The Publication Committee has increased the word count for manuscripts as noted below:

- **Feature Articles** ~ informational, explanatory, or critical analysis and interpretation of major trends or comprehensive reviews. Include clear implications for youth development practice and programming. 2,000 - 5,000 words
- **Program Articles** ~ discuss programs and outcomes or describe promising programs and pilot projects that have clear implications for youth development research, practice and programming. 1,500 – 4,000 words
- **Research and Evaluation Strategies** ~ describe innovative methodologies and strategies in the collection and analysis of quantitative or qualitative research and evaluation data. 1,500 – 4,500 words
- **Resource Reviews** ~ present analyses of materials, such as books, curricula or videos. 300 - 800 words

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Parenting Style and the Timing of Jewish Adolescents’ Sexual Debut
[Article 100502FA001]
Etzkin, Robby; Barnett, Rosemary V.; Smith, Suzanna; Schwartz, Stuart E.; Baugh, Eboni J.
Parenting style and its effect on the timing of Jewish adolescents’ sexual debuts were examined in the reported study. One hundred sixty-eight research participants between the ages of 18 and 22 from a large university in the Southeast participated in the study. A survey instrument was administered at three fraternities and two sororities to examine parenting style and sexual debut retrospectively. Data were analyzed using descriptive statistics, frequency chi square tests, and Analysis of Variance (ANOVA); while post hoc results were determined through Tukey’s honestly significant difference.

Results found that authoritative parenting provides a delay in the age of sexual debut for Jewish adolescents. All other parenting styles had mean ages less than the overall mean age of sexual debut, 17.10 years old, with indifferent parenting having the earliest debut. These findings suggest that parenting style may affect the timing of Jewish adolescents’ sexual debut. The study has implications for understanding factors that may affect the timing of a Jewish adolescent’s sexual debut and may help parents protect their adolescent from the negative effects associated with early sexual debut, such as low academic achievement.

Recommendations for future research include exploring the effects of family structure and peer networks to understand fully the many factors that affect the timing of adolescents’ sexual debut.

Getting Real Results with Ohio State University Extension’s Real Money. Real World. Program [Article 100502FA002]
Ferrari, Theresa M.; Bateson, Lisa; Hudson, Nancy; Bridgeman, Beth; Cochran, Graham
Youth development organizations have a unique opportunity to offer programs that help young people develop financial skills they need to become successful adults. This article describes Ohio State University Extension’s Real Money. Real World. (RMRW) and the systematic approach used to evaluate its effectiveness. The RMRW curriculum includes an active, hands-on experience that gives young people the opportunity to make lifestyle and budget choices similar to those they will make as adults. The realistic simulation creates a teachable moment. The outcomes of the statewide evaluation clearly indicate the curriculum accomplishes its goals of raising awareness, changing attitudes, and motivating students to plan for behavior changes concerning financial management, education, and career choices. The article concludes with a discussion of the organizational outcomes of conducting the evaluation.
**Structural Social Work Lens: A View of Youth Engagement in the Social Policy Life of their Communities** [Article 100502FA003]

*Hardy Cox, Donna; Sullivan, E. Michelle; Sullivan, Nancy E.*

Presented through a structural social work lens, this paper is a description and analysis of an action research project designed to explore factors that encourage or impede the engagement of youth in the social policy life of their communities. The project was conceptualized in a geographic region characterized by the erosion of community sustainability due to social economic disadvantage and out migration. The project aimed to strengthen communities by enhancing participation of youth in social policy development. It utilized a workshop designed and delivered by youth for youth and the development a Social Policy Action Plan (SPAP) to address a policy issue of concern in youth’s local community. Principles of structural social work, with particular attention to power sharing, unmasking the structures, collective consciousness, transformation of power/political and personal change, social action and community capacity building are applied as a lens to explore this project.

**Program Articles**

**Pairing Educational Robotics with Geospatial Technologies in Informal Learning Environments** [Article 100502PA001]

*Barker, Bradley S.; Grandgenett, Neal; Nugent, Gwen; Adamchuk, Viacheslav I.*

Educational robotics, when paired with geospatial technologies and taught in an informal educational environment, can be an innovative strategy to teach youth about science, technology, engineering, and mathematic (STEM) concepts. However, little is known about the true effects on conceptual knowledge and associated attitudes. Therefore, this study was conducted to examine the short-term effects of a series of five-day summer robotics/geospatial camps held in Nebraska. The study was conducted at six diverse locations and consisted of a five-day 4-H camp experience. The study examined the experiences of 147 youth between the ages of 10 and 15. A pretest-posttest quasi-experimental design was used in the study. Instrumentation consisted of a 37-question multiple-choice assessment targeting various STEM topics and a 38-question attitude questionnaire assessing STEM interests and attitudes. Results suggest that the 4-H robotics and geospatial summer camp program is a promising approach for supporting STEM-related learning and enhancing attitudes towards STEM.

**Service Learning Through Disaster Relief** [Article 100502PA002]

*Duerst, Donna J.*

The Rock County 4-H Disaster Relief Committee raised $1,550 to aid tsunami victims in Sri Lanka and then turned its attention to Hurricane Katrina relief efforts. Thirty-one 4-H youth participated in a service learning trip to the South with the objectives of helping hurricane victims, learning about new cultures and achieving personal growth during three days of service projects in Louisiana and Mississippi. Their written reflections and other evaluative measures revealed they learned about southern culture, gained a greater appreciation for their lives, gained self confidence and developed a desire to help others more often. The trip was a valuable developmental experience for the youth, and information from the trip could be utilized to create similar experiences based on service learning. This article provides an overview of the trip and describes the evaluation methods used to measure learning and assess personal growth.
Using an Active Learning Approach (the 4-H model) to Stimulate Social Change: Youth and Community Development in the Republic of Kyrgyzstan

Kock, Timothy K.

As Kyrgyzstan recovers from the collapse of the Soviet Union, the youth of this Newly Independent State (NIS) face troubling times. Poverty has become all too familiar throughout the country; its people, including youth, are losing hope and question their ability to be productive members of society (Lines & Kock, 2004). Kyrgyzstan’s future leaders – like all nations - are found among its youth of today. Therefore, it behooves the government and citizens of Kyrgyzstan to develop youth centers designed to enhance the skills young people need to succeed now and in the future.

This paper describes a program designed to teach Kyrgyz youth and adults teamwork, and civic responsibility through experiential learning activities. The paper outlines the steps taken and results derived from the hands-on trainings provided to the participants in one location in Kyrgyzstan. Findings from this study may have implications for other international youth development projects.

Research and Evaluation Strategies

What’s Going On? Developing Program Theory for Evaluation

Arnold, Mary E.; Nott, Brooke D.

This paper outlines the process undertaken to develop a program logic model into a program theory that could be tested through a large scale evaluation. Logic models are widely promoted to establish program intention and outcomes, thus setting the stage for effective program evaluation. However, the causal links in program logic models are often assumptive in nature, and lack the specificity of conditions needed in order for the program to achieve its planned success.

The authors share a process of observation and focus groups that allowed them to probe some of the links of the program logic model. The result presented is an “enhanced” logic model that reveals possible moderators of program success, which leads to the development of evaluation questions that will be used in a subsequent large-scale evaluation. The value of using an enhanced logic model for program evaluation leading to program policy changes and improvement is underscored.

Connecting and Communicating Effectively with Teens – An Online Survey of Teen Communication Styles

Bovitz, Laura

The lives of most teens are rapidly changing and involve methods of communication that are unfamiliar to many adults. An online teen communication survey was developed to assess how and why teens communicate in order to assist adult educators in developing more effective methods of communication with this audience. The survey was completed by 148 teens ranging in age from 13 to 19. The results of the survey provide insight into teen viewpoints on their preferred methods of communication and provides valuable lessons for adults who work with this age group.
Everybody eats. Period. Some of us prefer hamburgers. Some like veggies. But what we eat is only the beginning. Increasingly, interest in where our foods are grown and processed has emerged. As numerous grass roots organizations proffer information on local foods, it becomes critical for research-based youth programs to also encourage study on this topic. This article introduces a new curriculum that aims to help students learn about what we eat, where it comes from, and how it impacts the environment. The main goal is to help participants understand the concept of local food systems, how they operate, and how students and their families can be involved in creating positive changes. It targets students in grade school thru high school. By stimulating their interest at an early age, we can encourage their participation in the local food systems movement. The curriculum is available as a self-study guide at no cost. Email: raison.1@osu.edu.
Parenting Style and the Timing of Jewish Adolescents’ Sexual Debut

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Abstract: Parenting style and its effect on the timing of Jewish adolescents’ sexual debuts were examined in the reported study. One hundred sixty-eight research participants between the ages of 18 and 22 from a large university in the Southeast participated in the study. A survey instrument was administered at three fraternities and two sororities to examine parenting style and sexual debut retrospectively. Data were analyzed using descriptive statistics, frequency chi square tests, and Analysis of Variance (ANOVA); while post hoc results were determined through Tukey’s honestly significant difference.

Results found that authoritative parenting provides a delay in the age of sexual debut for Jewish adolescents. All other parenting styles had mean ages less than the overall mean age of sexual debut, 17.10 years old, with indifferent parenting having the earliest debut. These findings suggest that parenting style may affect the timing of Jewish adolescents’ sexual debut. The study has implications for understanding factors that may affect the timing of a Jewish adolescent’s sexual debut and may help parents protect their adolescent from the negative effects associated with early sexual debut, such as low academic achievement. Recommendations for future research include exploring the effects of family structure and peer networks to understand fully the many factors that affect the timing of adolescents’ sexual debut.
Introduction

Human sexual activity is inherently related to many of the social and public health concerns in the United States today (CDC, 2007; Calhoun & Friel, 2001). Early adolescent sexual activity has long been viewed as another case of problematic behavior (Jessor, et al., 1983; Meschke & Silbereisen, 1997). These concerns stem from the potential risks which include early unintended pregnancies, sexually transmitted diseases (Calhoun & Friel, 2001), and a high cost to society (Haurin & Mott, 1990). In 2007, the Center for Disease Control (CDC) reported that “48% of high school students had ever had sexual intercourse” and that “15% of high school students had four or more sexual partners.” As a result of early sexual behaviors by teens, public costs associated with welfare and other target programs have been well documented (Haurin & Mott, 1990; Hofferth, 1987). Costs to the individual in the form of lower educational and economic prospects and poor health have also been established (Haurin & Mott, 1990; Strobino, Grason, & Minkovitz, 2002).

This paper discusses a study which examined parenting style and whether it has an effect on the timing of Jewish adolescents’ sexual debut. Many studies have studied the timing of adolescent sexual debuts (Noell & Biglan, 1995; Rosenthal & Feldman, 1999; Whitbeck, Yoder, Hoyt, & Conger, 1999; Jackson, Barnett, Smith & Gibson, 2010). Studies have also examined the timing of sexual debut among racial and ethnic minorities (Brewster, Billy, & Grady, 1993; Gillmore, et al., 2002; Upchurch, Aneshensel, Sucoff, Levy-Storms, 1999). However, there is only a small collection of studies on the timing of adolescents’ sexual debut among religious minorities (Brewster, Billy, & Grady, 1993; Reed & Myers, 1991; Thornton & Camburn, 1989). Furthermore, there is an absence of literature specifically pertaining to Jewish adolescents’ sexual debut.

Literature Review

Adolescents are having sex at younger ages; therefore, they continue to make themselves vulnerable to potential pregnancies and sexually transmitted diseases. Well over half, 60.5%, of high school seniors report that they have had sex. The age of sexual debut has been steadily decreasing, the number of sexual partners before age 18 has been increasing, and only one in five adolescents remain virgins by the time they are twenty years old (Calhoun & Friel, 2001; Laumann, Gagnon, Michael & Michaels, 1994). The young adolescent is usually unprepared for difficult relationship decisions associated with close intimacy (Day, 1992), and because of their undeveloped decision-making process, they may not be able to realize the potential health and economic costs of their actions. Given these recent trends, adolescent sexuality continues to be an important area of research.

Parental Communication, Parenting Style, and Gender

Parents can directly reduce the risks their children face by encouraging them to avoid unprotected intercourse and by monitoring their behavior (Luster & Small, 1994). Despite belief that parents should be the primary source of information about sexuality, they usually are not (Abrams, 1990; Ansuini & Fidder-Woite, 1996; Rosenthal & Feldman, 1999; Rosenthal & Smith, 1995). When parents communicate about sexuality, they focus on issues relating to physical development and sexual safety rather than psychological, relationship-based topics, or those which might be considered personal, such as practicing safe sex and emotion-based intimacy (Baldwin & Baranoski, 1990; Rosenthal & Feldman, 1999; Rosenthal & Smith, 1995). Most parents find the task of providing sex education for their children daunting and one for which
they feel ill-equipped (Rosenthal & Feldman, 1999; Rosenthal & Smith, 1995) and few provide
detailed sex education with many not broaching the topic at all (Inazu & Fox, 1980; Kahn et al.,
1985). There is a clear gap between what parents know they should do and what they are
actually doing.

Although poor communication with parents and lack of parental support predicts early
adolescent sexual activity, delayed debut is associated with high levels of parental monitoring
and open parent-child communication about sexual issues (Levin, Xu, & Bartkowski, 2002). The
discussion of sex seems to delay sexual activity primarily among daughters of traditional
parents (Moore, Peterson, & Furstenberg, 1986) and researchers have concluded that parental
communication decreases sexual activity (Inazu & Fox, 1980; Meschke & Silbereisen, 1997).
However, findings on this topic have been mixed with some researchers finding no consistent
effects of parental communication (Miller & Moore, 1990).

Parents who use less power-oriented means of control tend to have children who exhibit more
socially appropriate behavior on a number of indicators (Miller, McCoy, Olson, & Wallace, 1986)
including age of sexual debut. Parental monitoring and harsh discipline have consistently been
shown to affect other minor deviant behaviors that are highly correlated with early sexual
intercourse (Simons, Johnson & Conger, 1996; Whitbeck et al., 1999). Some parenting styles
seem to be more successful than others; teens who view their parents as over controlling
exhibit a greater number of sexual risk-taking behaviors (Barber, 1992; Rogers 1999). Sexual
intercourse is most likely to occur among adolescents who have the most autonomy to date
whom they want, to date at an early age, and to control their own dating activities (Miller,
McCoy, Olson & Wallace, 1986). High levels of parental supervision (Hogan & Kitagawa, 1985)
and a close relationship between adolescents and their parents significantly predicted the later
timing of adolescent sexual activity (Meschke & Silbereisen, 1997).

On the other hand, excessive strictness and rules might increase the risk of having sexually
permissive children (Miller, McCoy, Olson & Wallace, 1986). Closer parent-child relationships
are associated with delayed sexual debut but not pregnancy experience (Moore & Chase-
Lansdale, 2001; Resnick, et al., 1997). It is more important if this close parent-child
relationship is characterized as close by the child rather than by the parent. Adolescents who
perceive their parents as being supportive and emotionally close report less sexual risk-taking
behaviors (Luster & Small, 1994; Rogers, 1999). A close parent-child relationship is also
important because poor parent-child relationships have greater effects on timing of first
intercourse than do positive parent-child relationships (Whitbeck, Yoder, Hoyt, & Conger, 1999).
Positive parental communication and monitoring are protective factors for all adolescents
academically, emotionally, and sexually. Parental discussion of sexual issues with their
adolescent may provide a delay in the onset of their adolescent’s sexual debut (Inazu & Fox,
1980; Meschke & Silbereisen, 1997).

Gender
One reason parents fail as sex educators may be their biased sexual communication patterns.
Parents, especially mothers, tend to tailor their communications to be gender-appropriate
(Rosenthal & Feldman, 1999), thus neglecting feminine issues for boys and masculine issue for
girls. Girls receive more information than boys about such topics as menstruation, abortion,
pregnancy, and sexual pressure, and less information on topics such as masturbation and wet
dreams (Rosenthal & Feldman, 1999). In addition, parents are less likely to discuss sex with
sons than with daughters (Kahn et al, 1985; Rosenthal & Feldman, 1999).
Different methods appear to work for each gender, with daughters having lower incidence of sexual activity when parents discuss sex and/or sexual television programming with them. With sons, traditional parents tend to listen and discuss decisions, which are related to lower probability of sexual activity. However, discussion is associated with a greater likelihood that sons were sexually experienced (Moore, Peterson & Furstenberg, 1986). This clearly illustrates a discrepancy between effective communication and gender.

Factors associated with sexual risk taking among females include low GPA, frequent alcohol consumption, low levels of parental monitoring, and a lack of communication about birth control with mothers. For males, in addition to low GPA, factors include frequent alcohol consumption, suicidal ideations, low levels of parental support, and a history of sexual abuse (Luster & Small, 1994). Males are also said to experience peer pressure to engage in sexual activity (Udry & Billy, 1987). Although other factors may have minor influences (e.g., the suppressing effects of pro-social activities for girls), the important predictors seem to be lack of parental supervision and monitoring (parenting style) and parents’ communication.

**Research Questions**

1. Is there a difference in the timing of sexual debut among Jewish adolescents raised with different parenting styles?
2. Do any of the four parenting styles positively affect (delay) the timing of Jewish adolescents’ sexual debuts?
3. Do any of the four parenting styles negatively affect (expedite) the timing of Jewish adolescents’ sexual debuts?

**Methodology**

This study will focused on examining parenting style and its affect on the timing of Jewish adolescents’ sexual debut.

The population consisted of Jewish students at a large southeastern university. Potential participants were identified through the University’s predominantly and/or historically Jewish fraternities and sororities. The final sample consisted of Jewish undergraduate students who elected to participate (N=168). After approval from the university IRB, participants were informed of the study at weekly chapter meetings in their fraternity or sorority house. Once participants gave consent, they completed a survey and identification numbers were assigned to protect identity. Data analysis was conducted after the surveys had been randomly mixed.

The survey instrument consisted of 25 items divided into a personal information section and two content sections. The data set was split into two groups: the first group of respondents answered “Yes” to having had sex (n=121) and the second group answered “No” to having had sex (n=47). The two groups allowed for analyses of those respondents who have experienced their sexual debut and the factors that affected it’s and also a description of the virgin group.

The sample population was mostly male (53%) due to data collection at three fraternity houses, compared to two sorority houses. All of the study participants were Jewish, half were Conservative (50.0%), and followed by Reform (45.2%), Orthodox (2.4%), and Other (2.4%).
Seventy two percent reported having previously had sex, and the mean age of sexual debut was 17.10 years.

**Age at first date and first serious relationship.** Fifteen years old was the most common (31.5%) age at first date while 3% reported not yet being on a first date. The vast majority (95.8%) reported there were no restrictions on the age at which they could first date. A small percentage (3.6%) said they were 13 years old when they had their first serious relationship, while 17.3% said they had not yet been in a serious relationship.

**Parental sexual communication.** When asked whether parents discussed sex with them, 49.4% said both parents did. Topics most frequently discussed were physical development (53.8%), abstinence (54.7%), safe sex (89.8%), emotion-based intimacy (51.6%), and consequences (83.6%). Also of interest was age at first sexual discussion with 13 (28.3%) being the most frequent. Participants reported that discussions occurred more than once (45%). Regarding depth of the sexual discussion, 60% reported very in-depth or in-depth. Concerning the content of sexual discussion (physical development, abstinence, safe sex, emotion-based intimacy, and consequences), 9.4% reported only discussing one topic, 21.9% two topics, 21.1% three topics, 21.9% four topics, and 25.8% reported discussing all five topics.

**Parenting Style**
The highest number of respondents believed their parents’ parenting style was permissive (45.8%). In regards to influence of parenting style on their decision to have sex, 8.3% responded a very strong influence on their decision, 19.6% responded a strong influence, 32.1% responded at least some influence, 25.6% said very little influence at all, and 14.3% said no effect at all.

**Research question 1.** For those respondents who had experienced their sexual debut (n=121), 41.1% classified their parents’ parenting style as Permissive (see Table 1). A significant relationship (f=6.42, p<.001) was found among parenting styles with respect to mean age of sexual debut. Tukey’s Honestly Significant Difference (HSD) test was used to test all possible pairwise comparisons between parenting styles and the mean ages of each parenting style (Table 2). Two significant relationships were found, the first between permissive and authoritative parenting styles and the second between indifferent and authoritative parenting styles (Table 3).
Table 1
Mean and standard deviation of group who experienced sexual debut (N=121)

<table>
<thead>
<tr>
<th>Parenting Styles</th>
<th>N</th>
<th>Mean</th>
<th>Std. Deviation</th>
</tr>
</thead>
<tbody>
<tr>
<td>Permissive</td>
<td>51</td>
<td>16.88</td>
<td>1.64</td>
</tr>
<tr>
<td>Authoritarian</td>
<td>13</td>
<td>16.69</td>
<td>1.44</td>
</tr>
<tr>
<td>Indifferent</td>
<td>9</td>
<td>15.55</td>
<td>1.74</td>
</tr>
<tr>
<td>Authoritative</td>
<td>48</td>
<td>17.73</td>
<td>1.38</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>121</td>
<td><strong>17.10</strong></td>
<td><strong>1.63</strong></td>
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</table>

<table>
<thead>
<tr>
<th>Sexual Debut</th>
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<tbody>
<tr>
<td>Male</td>
<td>74</td>
<td>17.16</td>
<td>1.80</td>
</tr>
<tr>
<td>Female</td>
<td>47</td>
<td>17.00</td>
<td>1.34</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>121</td>
<td><strong>17.10</strong></td>
<td><strong>1.63</strong></td>
</tr>
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</table>

Table 2
Post-hoc evaluation of significant differences of mean age of sexual debut between parenting styles.
Dependent Variable: reference point
Tukey HSD

<table>
<thead>
<tr>
<th>Parenting Style (I)</th>
<th>Parenting Style (J)</th>
<th>Mean Difference (I-J)</th>
<th>Standard Error</th>
<th>Sig.</th>
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</thead>
<tbody>
<tr>
<td>Permissive</td>
<td>Authoritarian</td>
<td>.19</td>
<td>.48</td>
<td>.98</td>
</tr>
<tr>
<td></td>
<td>Indifferent</td>
<td>1.33</td>
<td>.55</td>
<td>.08</td>
</tr>
<tr>
<td></td>
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<td>.31</td>
<td>.08</td>
</tr>
<tr>
<td>Authoritarian</td>
<td>Permissive</td>
<td>-.19</td>
<td>.48</td>
<td>.98</td>
</tr>
<tr>
<td></td>
<td>Indifferent</td>
<td>1.14</td>
<td>.66</td>
<td>.32</td>
</tr>
<tr>
<td></td>
<td>Authoritative</td>
<td>-1.04</td>
<td>.48</td>
<td>.14</td>
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<td>-1.33</td>
<td>.55</td>
<td>.08</td>
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<tr>
<td></td>
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<td>.32</td>
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<td></td>
<td>Indifferent</td>
<td>2.17</td>
<td>.56</td>
<td>.00(*)</td>
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Note. P<.05=*

Research question 2. Authoritative is the only parenting style that has a mean greater than the overall mean of sexual debut for the study, 17.10 years old. Significant statistical differences were found for permissive and indifferent parenting styles when compared to the authoritative parenting style (Table 2). It should be noted that, according to the survey instrument, the permissive and indifferent parenting styles both lack parental demandingness, which the instrument defines, as parent(s)/guardian(s) setting high standards and insisting that their children meet them. Therefore, it may be a single characteristic within a parenting style rather than an overall parenting style that affects the mean age of sexual debut.
**Table 3**
Comparison of mean age of sexual debut among variables under study ANOVA

<table>
<thead>
<tr>
<th></th>
<th>Sum of Squares</th>
<th>Degrees of Freedom</th>
<th>Mean Square</th>
<th>F</th>
<th>Sig.</th>
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<td><strong>Parenting Styles</strong></td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Between Groups</td>
<td>45.05</td>
<td>3</td>
<td>15.02</td>
<td>6.42</td>
<td>.00(*)</td>
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<tr>
<td>Within Groups</td>
<td>273.77</td>
<td>117</td>
<td>2.34</td>
<td></td>
<td></td>
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<tr>
<td><strong>Total</strong></td>
<td>318.81</td>
<td>120</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Gender</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Between Groups</td>
<td>.76</td>
<td>1</td>
<td>.76</td>
<td>.28</td>
<td>.60</td>
</tr>
<tr>
<td>Within Groups</td>
<td>318.05</td>
<td>119</td>
<td>2.67</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>318.81</td>
<td>120</td>
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</table>

Note. P<.05=*

**Research question 3.** A one-way ANOVA test and each mean was compared to that of the overall mean of sexual debut for the study, 17.10 years old (Table 3). Three out of the four parenting styles (permissive, authoritarian, and indifferent) had negative effects on sexual debut. The two parenting styles that have the greatest negative effect are authoritarian and indifferent (Table 2).

**Additional Results**

**Parenting Style**
Significant relationships (f=4.95, p<.05) were found between age at first date, age of first serious relationship, and age of first sexual discussion on mean ages of sexual debut. Therefore, all three had an effect on the timing of sexual debut. Frequency of sexual discussion (f=3.36, p<.05) and how in-depth the sexual discussion was (f=3.18, p<.05) also provided a significant relationship when comparing mean ages of sexual debut.

**Virgins**
A statistically significant relationship was found using chi-square test between respondents who had restrictions on the age they could first date (n=3) and respondents who had no restrictions on the age they could first date (n=44). Another significant relationship was found among responses for age at first serious relationship, with 24 respondents claiming to never have been in what they would consider a serious relationship. In addition, significant relationships were found among responses on sexual discussion, frequency of sexual discussions, and depth of sexual discussions prior to the respondent’s reference point which for virgins would be their current age. For virgins who had a sexual discussion (n=35), all but 6 had the discussion at age 13 or younger. For the number of sexual topics discussed for virgins, an average of almost three topics (u=2.81, SD=1.95) were discussed, indicating that discussing at least three topics may be a protective factor in the timing of Jewish adolescents’ sexual debut. Parenting style for the majority of virgins was permissive (55.3%) and authoritative (31.9%). Finally, a significant relationship (p<.05) was found among responses to the question on influence of parenting style and decisions to not have sex.
Discussion

Parenting Style
This study can conclude that parenting style does have an effect on Jewish adolescents’ timing of sexual debut. This finding is consistent with previous findings for adolescents that differences in levels of parental demandingness and responsiveness may affect adolescent outcomes (Baldwin & Baranoski, 1990; Levin, Xu, Bartkowski, 2002; Rosenthal & Feldman, 1999; Rosenthal & Smith, 1995). Authoritative parenting style, which produced the highest mean age of sexual debut (17.73), is high on both parental responsiveness and parental demandingness (Baumrind (1996, 1978). Both indifferent and permissive parenting styles are low on parental demandingness. It is possible that Jewish adolescents whose parents set high standards for them and insist that their children meet them, may have a later sexual debut than those Jewish adolescents whose parents do not.

When looking for parenting styles that may negatively affect the timing of Jewish adolescents’ sexual debut, the largest difference appears with the indifferent parenting style. Indifferent parents minimize the time and energy spent interacting with their child. Adolescents with indifferent parents are less likely to encounter positive outcomes then their peers with other parenting styles (Luster & Small, 1994; Meschke & Silbereisen, 1997; Rodgers, 1999; Whitbeck, Yoder, Hoyt, & Conger, 1999). This study’s finding of adolescents with indifferent parents having an early sexual debut is consistent with other studies’ findings.

With parents who are not demanding or responsive, the adolescent has opportunities to make decisions on their own. It has been found that sexual intercourse is most likely to occur among adolescents who have the most autonomy (the least parental control) to date whom they want, to date at an early age, and to control their own dating activities (Miller, McCoy, Olson & Wallace, 1986). Adolescents raised in indifferent homes are often impulsive and more likely to be involved in delinquent behavior and premature experiments with sex, drugs, and alcohol (Fuligni & Eccles, 1993; Kurdeck & Fine, 1994; Lamborn et al., 1991; Pulkkinen, 1982; Steinberg, et al., 1994). This study’s findings are consistent with previous research, not only for the indifferent parenting style having the worst outcome, but as well for the authoritative parenting style having the best outcome.

Gender
It cannot be concluded that gender has an effect on Jewish adolescents’ timing of sexual debut. This is consistent with the previous analysis of mean ages of sexual debut by gender.

Limitations
Each fraternity and sorority house at which data were collected allowed the study to be conducted at their house under the condition that it was voluntary, which may have contributed to the total number or respondents being low. In addition, the study was conducted at three fraternity houses and two sorority houses contributing to a slightly uneven gender distribution. Furthermore, the study focused on adolescent and sexual topics and personal information. This may have caused some respondents to not be as forthcoming and may have caused respondents to not always be truthful in all of their responses. Finally, respondents were asked to remember their decisions and their surrounding environment at the age of their sexual debut and to recall conversations with parents about sex, possibly as much as ten years before the survey. This delay could introduce some inaccuracy in reporting.
Implications for Practice

The present study has essential implications for Jewish parents, adolescents, communities, and youth workers. Many findings of this study suggest ways that Jewish parents can protect their adolescents against an early sexual debut, such as controlling the age that their child can first date, the age at which they first discuss sex with their child, the topics that they cover, and, most importantly, their overall parenting style.

Many previous studies show that an authoritative parenting style provides the most likely chances of positive child outcomes in various areas such as academic achievement (Steinberg & Silk, 2002). This study has shown similar findings in terms of the timing of sexual debut, with authoritative parenting apparently delaying sexual debut. If Jewish parents want to help their adolescents postpone sexual debut, then they must be warm but firm. In summary, Jewish parents must be consistently and realistically demanding of their adolescents as well as responsive and openly communicative in order to be able to protect against early sexual debut.

Recommendations for Future Research

This study is one of the first to specifically examine Jewish adolescents’ sexual debut. After determining that parenting style affects the timing of Jewish adolescents’ sexual debut, it is imperative to disseminate these results to afford Jewish parents information to protect Jewish adolescents from an early sexual debut. Some researchers recommend that parents need to learn how to provide the right amount of the right information at the right time, whether it concerns academic achievement or sexual development (Rosenthal & Feldman, 1999). Finally, providing this information directly to Jewish adolescents would create an educational forum based on facts that will help shape their decision making and allow Jewish adolescents to communicate openly and knowingly about sexual topics with their parents and their peers. As adolescents become interested in sex and become biologically capable of reproduction, the need to educate them on sexual topics becomes more important. Future studies might explore the effects of parenting style for non-religious or other faith-based denominations on the timing of adolescent sexual debut. It is particularly important for future research to consider that culture, religiosity, and family dynamics may create a unique dynamic for adolescents and parents that may impact sexual behaviors and outcomes.

References


Getting Real Results with Ohio State University Extension’s *Real Money. Real World.* Program

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Getting Real Results with Ohio State University Extension’s Real Money. Real World. Program

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Abstract: Youth development organizations have a unique opportunity to offer programs that help young people develop financial skills they need to become successful adults. This article describes Ohio State University Extension’s Real Money. Real World. (RMRW) and the systematic approach used to evaluate its effectiveness. The RMRW curriculum includes an active, hands-on experience that gives young people the opportunity to make lifestyle and budget choices similar to those they will make as adults. The realistic simulation creates a teachable moment. The outcomes of the statewide evaluation clearly indicate the curriculum accomplishes its goals of raising awareness, changing attitudes, and motivating students to plan for behavior changes concerning financial management, education, and career choices. The article concludes with a discussion of the organizational outcomes of conducting the evaluation.

Introduction

Financial literacy has become a concern recently due to reports of high credit card debt, low and negative savings rates, and increased personal bankruptcies (Bernheim, Garrett, & Maki, 2001) and the current state of the economy. A recent report by BusinessWeek declared that Americans are “functionally illiterate” when it comes to financial matters (Steverman, 2009). Likewise, youth financial education has emerged as an important issue in the research literature, popular press, and in discussions with educators, business leaders, and other key stakeholders. Numerous surveys conducted on American youth’s understanding of basic financial concepts consistently reveal that they lack basic knowledge of money management and do not possess adequate skills to be financially proficient in adulthood (Americans for Consumer Education and Competition, 2001; American Savings Education Council, 2001; Braunstein & Welch, 2002; Charles Schwab, 2007; Jump$tart, 1997, 2000, 2002, 2004, 2006, 2008; Yakoboski, 1999). Although some states do require it, financial topics are not taught systematically as part of elementary, middle, or high school curriculums.
There is limited documentation of results of financial education programs for youth. Studies of programs such as the National Endowment for Financial Education’s (NEFE) High School Financial Planning Program (Boyce & Danes, 1998; Danes & Haberman, 2005, 2007; Danes, Huddleston-Casas, & Boyce, 1999) and the I Can Save program (Sherraden, Johnson, Guo, & Elliott, 2009) indicate that participants increased their knowledge and skills. Evaluations of the Extension programs Money Talks in California (Varcoe & Fitch, 2003; Varcoe, Martin, DeVitto, & Go, 2005), Welcome to the Real World in Idaho (Spencer, Petty, Stimpson, Dees, & Riley, 2003), and 4-H Survivor Camp in Oregon (Smith, Cowan, & Schreiber, 2008) have shown that they are effective in educating youth about financial topics.

In the current economic climate, youth development organizations have a unique opportunity to offer programs that help young people develop financial skills they need to become successful adults. In this article, we will describe Ohio State University (OSU) Extension’s Real Money. Real World. (RMRW) program and the systematic approach used to evaluate its effectiveness. The article concludes with a discussion of the organizational outcomes of conducting the evaluation.

**Program Description**

In 2005 a group of Ohio State University Extension professionals developed Real Money. Real World. (Bridgeman et al., 2005) by adapting a curriculum that was originally from the University of Illinois (Welcome to the Real World). The RMRW (http://realmoneyrealworld.osu.edu) curriculum includes an active, hands-on experience that gives young people the opportunity to make lifestyle and budget choices similar to those they will make as adults. The goal of RMRW is to make youth aware of the educational decisions, income and expense factors relative to lifestyle choices, and the money management skills that will impact their adult lives. It was designed for middle school audiences, but in practice has been used with youth from 5th through 12th grades.

The curriculum contains the background information needed for educators to facilitate the program, such as checklists, simulation booth recruitment charts and booth-specific information sheets, sample press releases, and sample volunteer letters. There are six lessons with all necessary materials included.

- **pre-simulation preparation (4 lessons)**
  1. How Occupation Affects Income
  2. Deductions-What You See is Not What You Get
  3. How to Use Checking and Savings Accounts
  4. Making Choices- Preparing for the Simulation
- **hands-on simulation (1 lesson)**
- **post-simulation reflection and evaluation (1 lesson)**

The program is designed to be a partnership of the county Extension Office, local schools, and the business community. Collaboration among community partners is an effective strategy for implementing financial education programs (McKenna & Carroll, 1999; Morton, 2005; Suiter & Meszaros, 2005). Typically, the classroom teacher or the Extension professional conducts the pre-simulation lessons, while the county Extension professional also trains and leverages volunteers and business contacts in the community to organize the simulation.
During the pre-simulation preparation, participants assume the role of a 25-year-old adult. They select or are assigned an occupation with its corresponding monthly salary and are given the number children that will comprise the family they need to provide for (between 0 and 3). It is assumed that they have completed their education and that they are the sole provider in the family. After subtracting health insurance premiums, retirement savings, and taxes, the net income figure remaining is what students take to the simulation activity.

**Simulation**
Researchers have concluded that teaching financial literacy in the abstract appears to be ineffective (Braunstein & Welch, 2002) whereas highly interactive, reality-based courses in money management are effective in developing financially competent teens (Mandell, 2001; O’Neill, 2008; Varcoe et al., 2002). Therefore, an integral part of the *Real Money. Real World.* experience is the simulation. Based on the idea of learning through experience, simulation is an educational technique that involves immersion in an authentic, realistic situation in a way that approximates the real-life situation as closely as feasible. Simulations facilitate development of knowledge, proficiency, and confidence, and are believed to be superior to lecture methods for teaching about complex situations (Oh, 2002).

The *RMRW* simulation involves community volunteers staffing booths representing real-life businesses. At the appropriate booths, students make spending choices about typical monthly expenses and keep track of their transactions. They must pay for child care (based on the number and ages of their children), food, housing, utilities, transportation, insurance, clothing, communications, entertainment, and charitable contributions. They visit each booth, choose from among the options presented, and make the appropriate deductions from their check register. For example, at the food booth they are given the option of a low, medium, or high priced plan. Students are encouraged to make charitable contributions; they may select the option to volunteer, which involves giving their time, but not their money. If they are having difficulties making ends meet, they can elect to seek advice from a financial adviser. Whether they have adequate funds or run out of money, they continue through the simulation and finish with either a positive or negative balance.

Reflection following participation is also an important aspect of the learning experience. Reflection is necessary in order for the participants to evaluate the simulation itself as well as the knowledge gained in the process and its application to the real world (Kriz, 2003). Without this step, important insights may be lost, and the value of the simulation to the participants is diminished. Thus, during the post-simulation lesson students reflect on what they learned by completing a retrospective pre and post self-assessment containing questions regarding awareness and importance of financial topics. They also answer several open-ended questions regarding their major insights from completing the lessons.

**Program Evaluation**

Anecdotal reports indicated that *RMRW* had been used with success by Extension educators in Ohio. However, no systematic evaluation had been conducted to document this success. As part of a larger effort to enhance workforce preparation in 4-H, a concerted effort to increase use of *RMRW* began in 2006. Local Extension professionals could apply for 4-H Foundation grants of $1,000 to implement *RMRW* in their county. In exchange, they agreed to implement the entire scope and sequence of the curriculum, use the standardized self-assessment, and submit data
Two training sessions were held to familiarize Extension professionals with the curriculum and data collection procedures.

The purpose of the evaluation was to investigate the benefits of participation in *RMRW*. Results from other studies that conducted evaluation across multiple sites indicated that using a standardized evaluation tool was an effective way to address evaluation inconsistencies (Arnold, Bourdeau, & Nagele, 2005; Garst & Bruce, 2003).

**Measures**

The study design was descriptive and used a combination of quantitative and qualitative measures. The use of self-assessment is an established instructional practice to determine if learning objectives have been achieved, and the retrospective format is recommended to minimize response shift-bias in self-reporting (Benjamin, 1982; Danes et al., 1999; Howard & Daily, 1979; Howard, Ralph, Gulanick, Maxwell, Nance, & Gerber, 1979; Marshall, Higginbotham, Harris, & Lee, 2007; Pratt, McGuigan, & Katzev, 2000; Rockwell & Kohn, 1989). The self-assessment was completed as part of Lesson 6, the final lesson in *RMRW*. Items evaluated the extent to which participants had become more aware about the major concepts presented in the curriculum and the importance of what they learned using fixed-response and open-ended questions. Demographic questions (e.g., participants’ age and gender) were also included.

**Procedures**

Approval was obtained through The Ohio State University Institutional Review Board. Data were collected from *RMRW* programs conducted during 2007. Once the self-assessments were collected from the classrooms, responses were entered using an on-line Zoomerang® survey to allow for on-going data entry from multiple sites. The responses were summarized with descriptive statistics. Qualitative data were analyzed via open coding to identify themes.

**Participants**

Data were collected from a total of 19 counties (22% of the 88 counties in Ohio). Within the participating counties, 3,570 students in 47 schools contributed data for the evaluation. Of the participating youth, nearly equal percentages were female (51%) and male (49%). Youth were in the 5th grade through the 12th grade, and they ranged in age from 9 to 19 years old (Table 1).
### Table 1
Participant Characteristics (N=3,570)

<table>
<thead>
<tr>
<th>Grade</th>
<th>Number of Students</th>
<th>Percent</th>
<th>Age</th>
<th>Number of Students</th>
<th>Percent</th>
</tr>
</thead>
<tbody>
<tr>
<td>5th</td>
<td>46</td>
<td>1%</td>
<td>9</td>
<td>1</td>
<td>0%</td>
</tr>
<tr>
<td>6th</td>
<td>168</td>
<td>5%</td>
<td>10</td>
<td>28</td>
<td>1%</td>
</tr>
<tr>
<td>7th</td>
<td>313</td>
<td>9%</td>
<td>11</td>
<td>58</td>
<td>2%</td>
</tr>
<tr>
<td>8th</td>
<td>1,267</td>
<td>36%</td>
<td>12</td>
<td>222</td>
<td>6%</td>
</tr>
<tr>
<td>9th</td>
<td>376</td>
<td>11%</td>
<td>13</td>
<td>630</td>
<td>18%</td>
</tr>
<tr>
<td>10th</td>
<td>175</td>
<td>5%</td>
<td>14</td>
<td>1,026</td>
<td>29%</td>
</tr>
<tr>
<td>11th</td>
<td>82</td>
<td>2%</td>
<td>15</td>
<td>475</td>
<td>13%</td>
</tr>
<tr>
<td>12th</td>
<td>515</td>
<td>14%</td>
<td>16</td>
<td>307</td>
<td>9%</td>
</tr>
<tr>
<td>Multi-Grade(^a)</td>
<td>615</td>
<td>17%</td>
<td>17</td>
<td>353</td>
<td>10%</td>
</tr>
<tr>
<td>Missing</td>
<td>13</td>
<td>0%</td>
<td>18</td>
<td>356</td>
<td>10%</td>
</tr>
<tr>
<td>TOTAL</td>
<td>3,570</td>
<td>100%</td>
<td>19</td>
<td>17</td>
<td>0%</td>
</tr>
</tbody>
</table>

| Missing | 97 | 2% |

**TOTAL** | 3,570 | 100% |

\(^a\)Although in most instances the classrooms consisted of one grade level, some groups consisted of a combination of different grades.

### Evaluation Results

#### Awareness
Data showed the program made dramatic differences in raising youths’ awareness about the costs to maintain a household, care for children, and the deduction of taxes, as well as an awareness of the interrelationships of education, job, and income. At the completion of the program, at least 75% of the youth indicated that they were aware of these areas “a lot.” Results are summarized in Table 2.

### Table 2
Awareness of Financial Concepts Resulting from Participation in *Real Money. Real World.* (N=3,570)

<table>
<thead>
<tr>
<th>How much did you realize...</th>
<th>Not Much</th>
<th>A Little</th>
<th>A Lot</th>
</tr>
</thead>
<tbody>
<tr>
<td>Relationship of job and money</td>
<td>Before</td>
<td>After</td>
<td>Before</td>
</tr>
<tr>
<td>Cost to maintain a household</td>
<td>15%</td>
<td>3%</td>
<td>49%</td>
</tr>
<tr>
<td>Cost to care for a child</td>
<td>28%</td>
<td>5%</td>
<td>39%</td>
</tr>
<tr>
<td>Relationship of education and job</td>
<td>10%</td>
<td>4%</td>
<td>34%</td>
</tr>
<tr>
<td>Effects of spending decisions</td>
<td>21%</td>
<td>4%</td>
<td>46%</td>
</tr>
<tr>
<td>How much is deducted from pay</td>
<td>27%</td>
<td>3%</td>
<td>43%</td>
</tr>
</tbody>
</table>

**Note:** Some rows do not sum to 100% due to rounding.
**Importance**
Youth indicated participating in the program gave them a better understanding of what is involved in earning, spending, and managing money (Table 3). Their attitudes about the importance of financial topics regarding managing and spending money were the areas that had the largest increase in percentage points.

<table>
<thead>
<tr>
<th>How important did you think this was…</th>
<th>Not Much Before</th>
<th>Not Much After</th>
<th>A Little Before</th>
<th>A Little After</th>
<th>A Lot Before</th>
<th>A Lot After</th>
</tr>
</thead>
<tbody>
<tr>
<td>Doing well in school</td>
<td>6%</td>
<td>3%</td>
<td>29%</td>
<td>10%</td>
<td>65%</td>
<td>87%</td>
</tr>
<tr>
<td>Getting more education after high school</td>
<td>8%</td>
<td>3%</td>
<td>33%</td>
<td>13%</td>
<td>59%</td>
<td>85%</td>
</tr>
<tr>
<td>Learning how to make financial decisions</td>
<td>18%</td>
<td>2%</td>
<td>43%</td>
<td>16%</td>
<td>39%</td>
<td>82%</td>
</tr>
<tr>
<td>Saving money regularly</td>
<td>18%</td>
<td>3%</td>
<td>40%</td>
<td>14%</td>
<td>42%</td>
<td>82%</td>
</tr>
<tr>
<td>Waiting to have children until financially ready</td>
<td>16%</td>
<td>4%</td>
<td>36%</td>
<td>14%</td>
<td>48%</td>
<td>82%</td>
</tr>
<tr>
<td>Having a spending plan with both needs &amp; wants</td>
<td>18%</td>
<td>3%</td>
<td>48%</td>
<td>19%</td>
<td>34%</td>
<td>77%</td>
</tr>
</tbody>
</table>

Note: Some rows do not sum to 100% due to rounding.

**Intentions**
Nearly two-thirds of students indicated intent to change behavior in every category listed on the assessment (Table 4). These results showed that the curriculum was successful in providing motivation to change behavior by enhancing students’ awareness of financial topics and allowing them to experience making choices in the simulation.

<table>
<thead>
<tr>
<th>How likely is it that you will make changes in…</th>
<th>Not Likely Before</th>
<th>Not Likely After</th>
<th>Somewhat Likely Before</th>
<th>Somewhat Likely After</th>
<th>Very Likely Before</th>
<th>Very Likely After</th>
</tr>
</thead>
<tbody>
<tr>
<td>Learning to make financial decisions</td>
<td>5%</td>
<td>22%</td>
<td>73%</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Getting more education after high school</td>
<td>8%</td>
<td>20%</td>
<td>72%</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Saving money regularly</td>
<td>7%</td>
<td>25%</td>
<td>69%</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Waiting to have children until financially ready</td>
<td>8%</td>
<td>24%</td>
<td>68%</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Having a spending plan with both needs &amp; wants</td>
<td>6%</td>
<td>32%</td>
<td>63%</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Doing well in school</td>
<td>9%</td>
<td>30%</td>
<td>61%</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Note: Some rows do not sum to 100% due to rounding.

In an open-ended question asking students about the changes they intended to make, themes that emerged from student responses included spending habits, savings habits, attitudes, educational choices, and future planning (Table 5).
Table 5
Anticipated Behavior Changes Expressed by
Real Money. Real World. Participants

<table>
<thead>
<tr>
<th>Themes Generated</th>
<th>Representative Quotes to Support Themes</th>
</tr>
</thead>
<tbody>
<tr>
<td>Spending Habits</td>
<td>“Spending less on shopping.”</td>
</tr>
<tr>
<td></td>
<td>“How much money I spend on things I just want.”</td>
</tr>
<tr>
<td></td>
<td>“I will be wiser with my money.”</td>
</tr>
<tr>
<td>Savings Habits</td>
<td>“I plan on putting more money in savings.”</td>
</tr>
<tr>
<td></td>
<td>“How much I will save from each check.”</td>
</tr>
<tr>
<td></td>
<td>“Putting more money into a savings account.”</td>
</tr>
<tr>
<td>Attitudes</td>
<td>“My point of view towards money.”</td>
</tr>
<tr>
<td></td>
<td>“Not asking my parents for money all the time.”</td>
</tr>
<tr>
<td></td>
<td>“Set higher goals for myself.”</td>
</tr>
<tr>
<td>Educational Choices</td>
<td>“Working harder in school.”</td>
</tr>
<tr>
<td></td>
<td>“To study more and to get better grades so I can get into a good college.”</td>
</tr>
<tr>
<td></td>
<td>“I plan to try harder and pass all of my classes.”</td>
</tr>
<tr>
<td>Future Planning</td>
<td>“Save as much as possible before I have kids.”</td>
</tr>
<tr>
<td></td>
<td>“Be more aware of how much it cost to live and raise a family.”</td>
</tr>
<tr>
<td></td>
<td>“I will not spend as much as I thought I would. I will manage my money a lot better too.”</td>
</tr>
</tbody>
</table>

Overall Benefits
Data regarding students’ perceptions of overall benefits of the RMRW program were also collected (Table 6). When asked if participating in the program gave them a better idea of what is involved in earning, spending, and managing money, over two-thirds of students responded “a lot”. In addition, nearly two-thirds of the youth reported that participating in the program will help them “a lot” in the future.

Table 6
Overall Benefits from Participation in Real Money. Real World. (N=3,570)

<table>
<thead>
<tr>
<th>Participating in this program...</th>
<th>Not Much</th>
<th>A Little</th>
<th>A Lot</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gave me a better idea of what’s involved in earning, spending, and managing money</td>
<td>6%</td>
<td>25%</td>
<td>69%</td>
</tr>
<tr>
<td>Will help me in the future</td>
<td>6%</td>
<td>29%</td>
<td>65%</td>
</tr>
</tbody>
</table>

Self-Reported Learning
Students were also asked what they learned from participating in the program that surprised them the most. Themes that emerged from their responses included the cost of household items, the connection between income and education, the amount of deductions, the difficulty of separating needs from wants, and the consequences of mismanagement and debt. They also expressed a new understanding of how difficult money management can be and a realization of their parents’ role as providers. A complete list of themes with representative quotes can be found in Table 7.
<table>
<thead>
<tr>
<th>Themes Generated</th>
<th>Representative Quotes to Support Themes</th>
</tr>
</thead>
</table>
| Needs Versus Wants            | “How much it actually costs to live...to just live...It is hard to pay for your things you need let alone the things you want.”  
                              | “I never knew how much things really cost. I learned that it’s important to buy the necessary things first.”  
                              | “That it takes a lot to get both your needs and wants taken care of. And sometimes you have to give up something you want so you can fill your needs.” |
| Cause and Effect of Choices   | “I learned that each decision that you make affects the direction that your life will take.”  
                              | “The thing that surprised me the most was how much one choice affected the other choices you made.”  
                              | “I didn’t realize that if you make one bad decision then it affects you in the long run.” |
| Spending Wisely               | “In this program, I learned that it’s very important to handle your money wisely.”  
                              | “Maintaining enough money for fun and necessity is quite hard.”  
                              | “It doesn’t matter how much you make, you still need to spend wisely.” |
| Connection between Job and Lifestyle | “I learned how much your salary effects all the other decisions you have to make such as your car and house.”  
                        | “How much of a difference it makes to have a good job.”  
                              | “Getting as good of a job as you can so that you can make more money and have more money to spend in life.” |
| Connection between Education and Job | “If you get a good enough education you get a better paying job.”  
                        | “I learned that it is good to go to college to get more money in the future.”  
                              | “I didn’t know there’s such a big difference between pay between people with a bachelor’s degree and associate’s degree.” |
| Deductions                    | “How much pay gets deducted from taxes, health insurance, etc.”  
                              | “Taxes take more money than I thought.”  
                              | “How much money is gone before you even get your paycheck.” |
| Family Expenses               | “I learned how much money it takes to pay the bills and have a family.”  
                              | “How much money you need in order to support a family and the responsibility needed to maintain a family.”  
                              | “How much it really cost to run a household. I knew it was a lot but it turned out to be more than I thought.” |
| Making Financial Decisions    | “That you have to make wise decisions on how you spend.”  
                              | “I learned you should make good decisions about your money.”  
                              | “I learned the variety of things life can throw at you and how hard some decisions are.” |
| Monthly Expenses              | “That groceries are very expensive.”  
                              | “The monthly cost of things like child care and housing.”  
                              | “It surprised me how much bills cost a month.” |
| Saving                        | “How important it is to save money.”  
                              | “That it is always important to save money regularly, so eventually it will be there for you when you need it most.”  
                              | “The amount of money you can gain from a savings account over the years.” |
| Budgeting                     | “Just how hard it could be to budget your money.”  
                              | “I learned that I have to manage my money a lot more than I expected.”  
                              | “How hard it is to keep track of your money and buying what you want isn’t very important.” |
| Realities of the Real World   | “I learned that the real world is a lot more difficult than I thought.”  
                              | “I learned that what I thought was a lot of money ended up being a lot less than I thought.”  
                              | “There is so much you have to account for and a lot of the times you overlook that.” |
### Themes Generated

<table>
<thead>
<tr>
<th>Financial Responsibilities</th>
<th>Representative Quotes to Support Themes</th>
</tr>
</thead>
<tbody>
<tr>
<td>“That it’s really hard for parents to deal with all those money decisions especially with child care. I never thought it was that much.”</td>
<td></td>
</tr>
<tr>
<td>“I learned that the real life is hard now I know what our parents go through.”</td>
<td></td>
</tr>
<tr>
<td>“What I learned that surprised me the most was what my parents had to pay and how hard it can be on them.”</td>
<td></td>
</tr>
</tbody>
</table>

| Debt | “That I didn’t think that all of the stuff that you needed in life would actually get you in debt if you are not careful.” |
| “That is was extremely hard to stay out of debt.” |
| “I think the thing that surprised me the most is just how much it takes to pay off your debts.” |

| Credit Cards | “Credit cards could put you in bankruptcy and that even though you make the minimum payment it still takes a lot of time to pay it all.” |
| “The interest that is charged on credit cards. I have one but didn’t know too much about them.” |
| “What surprised me the most is the payment on credit card debt. This taught me to not use a credit card unless it’s an emergency.” |

**Note:** Selected responses to the question: “What surprised you the most about what you learned in Real Money. Real World?”

### Teacher Feedback

Teacher feedback was elicited at the program’s completion. The major themes running through the teachers’ comments were that the youth were very involved in the program, that they discussed topics presented in the curriculum at great length, and that the simulation portion of the program really allowed students to apply what they were learning. Representative comments from teachers are summarized in Table 8.

### Table 8

**Teacher Feedback about Their Participation in Real Money. Real World.**

- “This program was great. The class was noisier than usual, but the students talked about it all week. Parents were even asking me what was going on. We had just learned percents and this helped them apply what they learned. The students were very involved. We all loved it!” (Monroe County)

- “As teachers we can put out a lot of information, but when students hear from someone outside of school, it seems to give that information more credibility. Some of the examples really brought home the need for money accountability and responsibility. Good job!” (Jackson County)

- “The kids were able to see how real life and money go hand in hand. Most 5th graders don’t realize the value of money and how expensive their needs really are. My hope is that they now understand how important education is and how to weigh their needs versus wants intelligently.” (Miami County)
Discussion

Students often indicate that the realistic simulation approximating real-life situations and choices they will have to make as adults is very helpful, eye-opening, enjoyable, and much more valuable than lecture. By creating such a teachable moment, RMRW sets the stage for pursuing financial topics in greater depth than can be accomplished in six lessons. Educators presenting the RMRW curriculum also need to be aware of other complementary financial literacy resources (e.g., NEFE’s High School Financial Planning Program [www.nefe.org], the 4-H curriculum Financial Champions [Mincemoyer & Furry, 2003], the National Student Loan Program’s financial literacy on-line website [http://www.nsipflonline.org], and the eXtension Financial Security for All Community of Practice [Pankow & O’Neill, 2009]).

The outcomes of the statewide evaluation clearly indicate the curriculum accomplishes its goals of raising awareness, changing attitudes, and motivating students to plan for behavior changes concerning financial management, education, and career choices. RMRW is providing more Ohioans with the knowledge and skills necessary to succeed in the 21st century. In a time when instruction in personal finance is increasingly critical to the effective development of financial competence, the use of the RMRW and others with documented impacts is strongly encouraged.

Organizational Outcomes

A strength of this coordinated evaluation effort is that the same tools for evaluation were used throughout the state. We used the self-assessment completed by students to provide data for the evaluation. Thus, it did not require additional time for teachers to administer. Because the on-line option allowed for continuous data entry and review of results, we were able to summarize the results whenever necessary throughout the year-long process of multi-site data collection. At the conclusion of the evaluation, we produced an executive summary (Sotak, Ferrari, Hudson, Cochran, & Bridgeman, 2007) and a full report (Sotak, Ferrari, Hudson, Cochran, & Bridgeman, 2008) to share the results with others.

Organizational outcomes resulted from the statewide use of the curriculum and the availability of evaluation results. An evaluation with statewide scope positioned Ohio 4-H Youth Development to apply for additional funding when opportunities arose. As a result of our ability to present documented success with youth financial literacy, the Ohio 4-H Foundation was able to submit a proposal to a bank that resulted in $15,000 in external funding to support youth financial education programs.

• “Some of the students were surprised at how much money they had to spend for things they’d taken for granted (and seemed to show a better appreciation for their parents). Having children to support was also an issue they discussed. Overall, most of the students seemed to recognize the importance of furthering their education and of raising a family.” (Wayne County)

• “It made me realize that as teachers, we should implement more lessons leaning towards the real world. Students were able to realize the importance of understanding what to expect when they become adults. I hope this will benefit them in their future decision making.” (Greene County)
presented an opportunity for Extension professionals in 4-H and Family Consumer Sciences to collaborate on their programming efforts. In 2007, the curriculum was updated to include current costs and document the sources of the cost data. In addition, 500 family and consumer sciences teachers were made aware of RMWR through conference presentations around the state. This collaboration earned the RMWR team a multi-disciplinary Team Teaching award from the state chapter of Epsilon Sigma Phi (an Extension professional association). We demonstrated that working together in a unified effort to reach teachers and youth about the topics presented in the curriculum can create a larger impact than when efforts are unfocused or fragmented.

In addition, RMWR was selected as an OSU Extension Signature Program. Signature programs were identified in the 2008 OSU Extension Strategic Plan as being successful, replicable programs that reflect OSU Extension’s capabilities and are interdisciplinary in nature. As a signature program, additional resources were made available to support RMWR program implementation and gain visibility with stakeholders.

RMWR use has continued, with 34 counties reporting use of the curriculum in 2009. It has been used successfully with diverse audiences, including juvenile detention centers, pregnant and parenting teens, and rural and urban settings. County Extension professionals have secured additional local resources to support the program. The curriculum was updated again in 2009. A follow-up study of participants in 2009 documented that students reported additional impacts several months after participation (Bateson, 2009; Bateson & Ferrari, 2009).

Devoting sufficient resources to a specific, focused purpose and making a concerted effort to replicate a program at multiple sites allowed us to document impacts. Others could follow a similar process with similar timely topics.

Notes:
The RMWR curriculum is available from http://estore.osu-extension.org/searchproducts.cfm?step=2. Questions regarding the evaluation results should be directed to Theresa Ferrari. Questions regarding program implementation should be directed to Beth Bridgeman or Nancy Recker (recker.22@osu.edu).

References


Structural Social Work Lens:
A View of Youth Engagement in the
Social Policy Life of their Communities

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Structural Social Work Lens:
A View of Youth Engagement in the Social Policy Life of their Communities

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Abstract: Presented through a structural social work lens, this paper is a description and analysis of an action research project designed to explore factors that encourage or impede the engagement of youth in the social policy life of their communities. The project was conceptualized in a geographic region characterized by the erosion of community sustainability due to social economic disadvantage and outmigration. The project aimed to strengthen communities by enhancing participation of youth in social policy development. It utilized a workshop designed and delivered by youth for youth and the development a Social Policy Action Plan (SPAP) to address a policy issue of concern in youth’s local community. Principles of structural social work, with particular attention to power sharing, unmasking the structures, collective consciousness, transformation of power/political and personal change, social action and community capacity building are applied as a lens to explore this project.

Introduction

This paper presents the description and structural social work analysis of an action research project. It is designed to identify factors that encourage or impede the engagement of marginalized young people in the social policy life of their communities. The project was conceptualized and undertaken within a provincial context characterized by the erosion of community sustainability due to social economic disadvantage and outmigration. The purpose of the project ultimately is to strengthen communities by enhancing participation of excluded youth in social policy development. In particular, it presents the development and pilot testing of an educational workshop that facilitates the enhancement of skills and awareness of youth regarding social policy. The project emerged from a belief that the depth and breadth of the social capital base in communities can be enriched when youth gain an increased understanding
of the role and impact of social policy at local, regional, provincial, and national levels. The workshop design provides an opportunity for the young people to operationalize their new knowledge and awareness by developing a Social Policy Action Plan (SPAP) to address a policy issue of concern in their local community.

**Review of the Literature**

For the purpose of this project social policy was defined for the youth as, “the rules for living in five dimensions or spheres of society which make it possible for people to live in a cooperative and satisfying manner.” This concept was further simplified for the youth, defining it as, “a range of rules which affect a person socially” – such as a curfew at home, speed limits, alcohol age limits. Community development in this study is described as the empowerment of youth through the provision of knowledge about social policy and guided practical experiences or SPAPS to enable their voice to effect change in their communities. Literature related to youth engagement and structural social work also provide further context for this study.

**Youth engagement.**

The working definition and key messages of the Centre of Excellence for Youth Engagement (2009) was adopted in this study. They include: “Youth engagement is the meaningful and sustained involvement of a young person in an activity focusing outside the self.” Full engagement consists of a cognitive component, an affective component, and a behavioral component - Head, Heart, Feet.

**Key messages of project:**

- Meaningful youth engagement produces benefits to youth and the community in which they live.
- Through engagement, youth gain a sense of empowerment as individuals and make healthy connections with others, which is associated with reduction of risk behaviours and increased participation in positive activities that contribute to community.
- Youth engagement is a cross-cutting, comprehensive, strength-based practice for effective protection, prevention and intervention on multiple issues.
- The community gains from the contributions that youth bring to organizations, activities and their relationships.

In addition, the literature has identified a link between youth engagement and a wide variety of positive outcomes including:

- reduced alcohol use and higher school achievement (Eccles & Barber, 1999),
- reduced socio-emotional difficulties (Mahoney, Schweder & Stattin, 2002),
- lower rates of school failure and drop-out (Mahoney & Cairns, 1997), and
- greater commitment to friends, families, and communities (Center for Excellence in Youth Engagement, 2003).

It also provides data to assist communities in establishing practices that encourage youth engagement. These include:

- providing youth with opportunities for engaging in experiential activities that allow them to make a difference,
allowing youth to follow their passions and to speak about their experiences,
building collaborative and trusting relationships with other youth,
creating networking opportunities for youth, and
engaging youth in decision-making (Dumond, Warner & Langlois, 2003).

The rationale for and design of this project draws substantially on these findings.

Structural social work literature specifically provides an academic context for the conceptualization of the project in terms of its principles and design. The concept of full participatory democracy connotes the social inclusion of all members of a society; in fact, it inherently means that every person is and feels to be a “member” (Falck, 1988). Its existence would preclude marginalization; that is, social/economic/political exclusion of some people by those with power. Each person would hold a social location that genuinely carries a role and a voice in determining policy directions that affect his/her community life.

Lundy (2003) addresses the potential for social work to make a contribution in communities to activate the collective resources of residents toward enhanced strength and sustainability. In addition to social work’s “promotion of critical thinking [to assist] members in gaining an understanding of the inequities facing them,” is its facility to “engage community members” in goal advancement through “a process of communication among members and between them and the wider community” (p. 175). In communication, they engage in collective consciousness raising, “sharing” their experiences .... What were originally experienced as private, personal problems are now seen in terms of their political dimensions” (Mullaly, 2002, p. 175). Community capacity building in this personal/political context also is supported by the literature on conflict theory/power distribution which positions such community based work as a challenge to established power (Hustedde & Ganowicz, 2001).

The objectives and design of this project resonate with Lundy’s statement: “Building capacity in communities...helps members to take control of their communities, establishes local leadership, and lays the groundwork for much-needed community resources” (ibid.). Given that the young people involved in this study may remain as lifelong community members, enhancement of their existing skills and development of new competencies for social action to support community sustainability are vital. Out of this personal/political reality and theoretical context, the project was conceptualized, undertaken and presented here through a structural social work lens.

Description of the Project

In the North Atlantic island province of Canada, the last decade has seen the advent and implementation of several broad ranging policy initiatives, starting with the Strategic Social Plan (Government of NL, 1998) of the 1990s and the nationally recognized Poverty Reduction Strategy (Campaign 2000, 2005). All of these programs include elements intended to address the needs of youth with a focus on the development and expansion of skills toward income security (Government of NL, 2007). The failure of resource-based industries has left communities devastated. For example, the failure of the ground fish industry has resulted in the “leaving behind” of many youth with the least capacity to market them and engage in the civic life of their communities and hence face a future of possible social exclusion from mainstream society.
**Project overview.** Working with a project coordinator, a group of young people affiliated with the provincial Community Youth Network (CYN), in an urban centre, were recruited and designated as “the Reference Group” (RG). Their roles were to design a youth orientated workshop on social policy, to participate in its delivery at four sites across the province, both urban and rural, and to take part in the identification of the resulting learning. The overall project team consisted of the RG, a project coordinator, and the university-based researchers.

**Project participants.** The target population for this project was composed of two categories of youth, the first being the RG – the youth we designed and delivered the workshop for and the second being the youth who participated in the social policy workshop across the four sites. The RG was comprised of 7 youth (2 males and 5 females) average age 16, all attending school. An average of 12 youth participated in each workshop. Overall, all participants faced multiple barriers to their general well-being and future life chances, including high rates of youth poverty, unemployment, literacy difficulties, and very low population density with associated infrastructure limitations. Despite additional challenges for the RG members of limited education, drug and alcohol use, learning disabilities, and absence of positive role models and supports, they sustained their involvement with the project over its full fifteen month duration.

**Social policy workshop.** At each workshop site the RG organized the other youth participants into “tribes” as part of a Survivor Island Game, as described below. This game format was an original idea contributed by the RG, and all workshop activities took place accordingly. Throughout the two day workshop there were two streams of activity. The first activity required groups to respond to interpersonal issues within their imaginary communities, e.g., “someone in the community is unable to care for themselves,” and then to identify the considerations necessary for the community to live co-operatively. The second activity was a “mapping activity” which introduced the youth participants to concepts of social policy by inviting them to examine policies that impact their actual lives within five spheres: personal, home, school and social environment, local community, and provincial/national. Life size poster outlines of the human body were provided for each tribe to write real time examples of policies relevant to each sphere. Subsequently, a representative of each tribe presented the recorded content to the whole group and attached the “person” onto a wall.

In addition, the workshop was punctuated by various team-building and energizing activities, planned and facilitated by the RG. One was an exercise where participants were asked to complete an inventory of their own community resources. The final exercise was the identification of a Social Policy Action Plan (SPAP) regarding an issue of concern to youth in their local community. Examples included an environmental “clean up” project in a rural northern Aboriginal community and programming at a regional youth resource centre. All workshop activities were characterized by clarity, flexibility, choice, and fun while still engaging youth on the social policy theme. The dynamic of the workshop was fast paced, varied, energetic, interactive, and relevant to the local youth (Sullivan, Sullivan, Hardy Cox, & Johns, 2008).

**Structural social work applications.** The theoretical and ideological foundation of the project solidly reflects constructs of structural social work. The project was guided by principles of respect, empowerment, youth inclusion, social self-determination, and a strengths focus (Carniol, 1992; Hustedde & Ganowicz, 2001; Lundy, 2003; & Mullaly, 2002). This was supported throughout the “process” of the project in the on-going collaborative model whereby
the project team worked together in a dynamic of shared power to design, plan, and present the social policy workshop. Respectful reciprocal feedback became the working culture.

The relationship that developed between the project coordinator and the RG, were documented in the coordinator’s logs as being characterized by teaching, personal guidance, modeling, authenticity and candor, genuine warm acceptance and care, safety, and comfort. The project coordinator consistently reinforced the principle of mutual respect. For example, a clear message was communicated to workshop participants by the RG that “there are no wrong answers.” Consequently, the RG adopted it as an essential working concept and incorporated it in the content and dynamics of the workshop. This was illustrated during the workshops when personal issues compromised the ability of certain RG members to stay engaged. At these times, the young person was redirected to an alternative activity, in order to maintain inclusion and facilitate the flow of the workshop. As a result of this attention to process, each RG member ultimately participated in some aspect of the workshop, with each one’s abilities making a contribution to the whole endeavour. Some contributed more to the design and content; others to the workshop delivery. RG members variously served as one another’s checks and balance and supports. There were many examples of young people helping one another, one being the facilitating of verbal participation of peers when literacy was a barrier.

A comfortable and safe climate was created, particularly evident in the person mapping exercise. Workshop participants often assigned personalities and names to the human forms used in the mapping exercises sometimes based on actual “characters” well known and beloved in the local community. The shared knowledge of these characters enhanced participants’ ownership, and enjoyment of the workshop.

At all sites, project team members’ demonstrated their cultural sensitivity. This was particularly apparent at an Aboriginal site where English was not the first language of some participants. A team member, who was knowledgeable about Aboriginal issues, was able to provide culturally appropriate support, which appeared to be effective as Aboriginal youth became full participants in the workshop discussions and activities. The social policy workshop design, with its youth centered focus assured by the input of the RG, strongly reflected the underlying project principles of participatory democracy and youth-friendliness. Throughout the project, tangible functional supports were provided in order to facilitate engagement and inclusion. Included for the RG were: access to computers, provision of food, transportation to workshop development sessions, and activities to support their formation as a “team,” such as indoor wall climbing and bowling.

For workshop participants, transportation and nutritious food were provided. This served to reduce disparity and also provide time for informal socialization and networking among the youth at each site. All these practical supports served as incentives that further enlivened an already existing sense of enthusiasm among the youth and solidified their engagement in, enjoyment of, and commitment to the project.

Methodology

Data collection. To track the growth of the work of the RG multiple data sources were utilized:

1) the coordinator submitted a weekly log of on-task activity and relational content,
2) youth feedback was obtained in an independently conducted focus group evaluation,
3) the coordinator consolidated the youth input into various mapping exercises of the workshop groups,
4) key informant interviews during the summative evaluation and
5) researcher’s notes captured routine conference calls with the coordinator and the face to face meetings with the youth at the various workshop sites.

**Analysis**

The project and its process exemplifies principles of structural social work, with particular attention to:

1) collective consciousness,
2) unmasking of structures,
3) power sharing,
4) social action and community capacity building, and
5) transformation of power/political and personal change.

(Carniol, 1992; Hustedde & Ganowicz, 2001; Lundy, 2003; Mullaly, 2002). Each principle is explored below:

1. **Collective Consciousness**

From the initial recruitment of the RG members an inclusive “sharing of experience” format was used to generate basic understanding of the intent of the project, new awareness around policy issues, and ultimately the actual content of the workshop. The research team members were challenged to accommodate the cultural diversity and varied developmental functioning/maturity levels among the youth. However, their capacity for verbal participation and willingness to share their respective views served to integrate their differences into the project experience. For example, brainstorming as an idea-generating technique appeared to be well within their comfort zone and proved fruitful.

The step by step workshop design, started from the personal (self), and moved through the five levels of civil society contributing to the RG youth’s awareness about the structures of society. A critical component for the RG youth was being part of the project development process from the beginning - a process which included workshop development and delivery to youth at other CYN sites. Taking such leadership and ownership contributed to the RG’s knowledge of social policy. In their geographic region social policy typically fell within the domain of adults having an advanced educational and/or experiential background. Recognition of the young people’s ability to provide leadership at various sites and to train peers further reinforced their proprietary perspective of their own knowledge base and rightful role in the social policy context. For example, by the final workshop, the RG members demonstrated their understanding of social policy content by communicating their knowledge of social policy to the workshop participants. The workshop design, development, and implementation served as a living lab illustration of the viability and relevance of youth engaging in the social policy life of their communities. Further, this ownership was affirmed when at the airport after the final workshop, the RG members were overheard explaining their workshop and discussing social policy to an interested bystander!
Relationship served as a means to facilitate collective consciousness. Relationships evolved between the RG and the project coordinator; between youth workshop participants and their local CYN coordinators; among various youth communities; between adult members of the project team and the RG. During pre-engagement phases and ongoing project activities, these relationships contributed to creating a safe environment which was evidenced by energetic engagement in the workshops.

2. Unmasking of Structures. Structural social work theory identifies structures in society which impact on individuals. Primary structures include patriarchy, capitalism, ageism, ableism and heterosexism. Secondary structures include family, community and bureaucracy. The workshop design emerged dramatically as a tool used by the young people to unmask the structures of society on the five levels (personal, home, school and social environment, local community and provincial/national) within which social policy or (in youth speak “rules”) exists. The thematic approach, the interactive nature of the activities, the small group work, and in particular, the personal mapping activity helped participants to become aware of policies across society, and triggered a beginning understanding of how these policies function and impact upon everyday life. The ideas generated by the youth in the mapping exercises revealed creative, and age and stage appropriate ideas, which in turn created fertile ground for a collaborative learning experience. The collaborative process welcomed the adult team members contributions to the youths’ learning by providing where needed some clarity on content and helped contextualize the content to the local community, thus assisting the young people to bridge the workshop content to their local reality.

Despite the challenges, e.g., developmental and maturity disparities for RG members and workshop participants, their learning was facilitated by the design of the workshop in which the sequential exercises built upon one another, making incremental and cumulative learning possible. The young people were curious about what was next and what new clue would be revealed to crystallize their appreciation of social policy. At times, the youth would wonder about the purpose of an exercise, and then as the next one or two steps unfolded, they “got it” - an epiphany of insight was evident and they often were amazed at the connections they were able to see.

3. Power Sharing. From the outset, the adult team members regarded the youth members as full and essential partners in the development and implementation of the project. This was based on a belief that the young people held knowledge that was relevant to achieving the purposes of the work; work from which benefits most effectively could affect their ongoing lives. For example, at the initial information and recruitment meetings to develop the workshop, the RG brainstormed the participant’s baseline notions of policy. This appeared to be well within their interest and ability zones as they easily gave abundant examples of aspects of policy drawn from their own life experience such as rules related to loitering, school policies, alcohol and driving.

The workshop design contributed to the sense of shared power in the young people’s learning process, both in the workshop development and in the delivery phases. For example the youth took the lead in the development of the workshop and its delivery. Recognition of their own abilities to accomplish the work and to provide leadership at the various sites reinforced their realization of power shared with the adult team members. This is well illustrated by an exchange observed between one of the youth members and a stranger encountered at the airport in Labrador following the final workshop. When asked the purpose of the trip, her
response was articulate and accurate, but more importantly passionate and personal. Her comments included details and frequent assertions of ownership such as “we developed ...” and “we delivered ...,” language used consistently and with pride throughout the exchange, while her youth colleagues standing nearby nodded their agreement.

Power sharing was evident in the numerous relationships within the project; each holding some capacity for generating a sense of ownership in the young people which in turn helped them to discover the power within, and the power shared between them and with the adult partners. Across the lifecycle of the project there was a visible track of power sharing which flowed from the principles underlying the project. The sharing of power was exemplified initially in the project design which constructed the project team as comprising youth and adult members. It was seen to continue in the engagement of the youth by the project coordinator in the development of the workshop; in the delivery of the workshop by the RG; and in the final exercise when the local youth participants generated a means to partner with community leaders to refine further and implement their SPAP idea.

It is notable that we encountered almost no attrition in the RG. All seven RG members remained active participants throughout the fifteen months of the project, in spite of frequent crises and numerous obstacles in their lives. This suggests the importance of inclusion, belonging, participation, and ownership that the young people experienced as participants. They truly were members of the team and felt that belonging and centrality to the project.

4. Social Action and Community Capacity Building. Structural social work recognizes the importance of social action to create social change. In this light the workshop was designed to culminate with the identification of a Social Policy Action Plan (SPAP), which entailed an invitation to the youth participants to identify areas in their local communities where they believed change was warranted. For example, in the school and social realm the youth in one particular workshop identified a school policy to institute regular Fast Fridays (on a once monthly basis, to reduce the length of the standard class by 15 minutes to allow for a mid-day dismissal). In the local community realm, they targeted alteration to municipal by-laws regarding loitering. In the provincial/national sphere, improvement in social assistance rates, changes to hunting regulations and decisions regarding the closure of the commercial fishery. The range of these suggestions indicates the breadth and depth of the young people’s awareness, and speaks directly to their potential to develop an active citizen role in the sustaining of their communities and perhaps ultimately in a wider context.

Youth suggestions for potential policy work were prioritized, taking into account the feasibility of follow-through. With discussion having proceeded and the desire for regular Fast Fridays selected as a SPAP, the entire workshop group then determined whether it would be necessary to create a new or modify an existing policy. They identified allies in the adult community to engage as active partners in support of their initiative. The group also identified steps in social marketing to achieve the desired change: meeting with the town council, posting flyers, delivering pamphlets, speaking on public service radio and at community meetings, and writing letters to the editor and articles in local newspapers. The final steps in operationalizing the social action project were the identification of a core SPAP team, garnering local organizational support for the work, and establishing a consultation relationship with the research project team. In sum, local communities such as this one, as a result of the RG workshop now had a driving force in their community to address such issues.
5. Transformation of Power/Political and Personal Change. Transformation of power emerging from this project was observed to lie within the two interconnected spheres of personal and political change. Over the course of the year the RG youth acquired and demonstrated their awareness of the power of the “youth voice” in social policy by guiding their peers- the workshop participants- toward the identification of various Social Policy Action Plans (SPAP’s). The RG youth over the duration of the project discovered and honed such personal attributes as self-confidence, public speaking, poise, creative expression of ideas, problem solving, and ease in cooperative and collaborative team membership. This observed development augurs well for the future social policy engagement for contributing to the social policy life of their communities. The transformation of personal power can be seen in the summative reflection of one youth who synthesized his experience with the reflection: “I am proud.”

Conclusion

In sum, the workshop design developed by youth for youth, engaged youth participants through its use of interactive group work that raised their awareness of power possible when people work together toward shared purposes. As this approach to the delivery and processing of social policy content was seen as establishing the ground work among youth who may become the future local leaders, the project can be viewed as a means of building community capacity.

Knowledge is power and the Social Policy Action Plan (SPAP) project provided all the youth participants with the opportunity to learn about the structures of society and the roles they can play to maintain or change these structures. It is anticipated that the lessons learned, and more poignantly, the sense of personal and collective power, ability, and agency to effect community-based social policy, will endure in these young people as they carry out their citizen roles through adulthood.

We recommend that other agencies working with youth within a capacity building framework apply the fundamental principles of structural social work as outlined here. As identified and reinforced in Sullivan & Sullivan (2010) and Sullivan et al. (2008, 2010), the primary factor found to have engaged the youth in policy work was the foundational belief that youth have a right to a voice on the social policy issues of their communities, and that they possess the strengths and skills to implement effective social policy action plans.

References


Pairing Educational Robotics with Geospatial Technologies in Informal Learning Environments

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Pairing Educational Robotics with Geospatial Technologies in Informal Learning Environments

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Abstract: Educational robotics, when paired with geospatial technologies and taught in an informal educational environment, can be an innovative strategy to teach youth about science, technology, engineering, and mathematic (STEM) concepts. However, little is known about the true effects on conceptual knowledge and associated attitudes. Therefore, this study was conducted to examine the short-term effects of a series of five-day summer robotics/geospatial camps held in Nebraska. The study was conducted at six diverse locations and consisted of a five-day 4-H camp experience. The study examined the experiences of 147 youth between the ages of 10 and 15. A pretest-posttest quasi-experimental design was used in the study.

Instrumentation consisted of a 37-question multiple-choice assessment targeting various STEM topics and a 38-question attitude questionnaire assessing STEM interests and attitudes. Results suggest that the 4-H robotics and geospatial summer camp program is a promising approach for supporting STEM-related learning and enhancing attitudes towards STEM.

Introduction

The Nebraska 4-H program, with grant funding from the National Science Foundation, is developing a program to increase science, technology, engineering and mathematics (STEM) achievement and interest using robotics and geospatial technologies. The widespread availability of education robotic platforms such as the LEGO NXT Mindstrom kit, handheld Global Positioning System (GPS) receivers, and geographical information systems (GIS) software like
GoogleEarth and ArcMap make it possible for youth (ages 10 to 15) to explore the integration of these technologies. The curriculum was developed by Nebraska 4-H and faculty from University of Nebraska’s Biological Systems Engineering Department, in cooperation with Carnegie Mellon University’s Robotics Academy which involves 40 hours of instruction. The 40-hour summer camp activities include the building and programming of robots, exploring handheld GPS receivers while collecting georeferenced information and navigating outdoors, and the development of GIS maps. The camp activities were led by project staff and in some cases faculty from the University of Nebraska. The content and context for the activities were delivered in a short introductory lecture format followed by hands-on activities. Two formal STEM-related assessments were also administered, one related to conceptual learning and one related to attitudes. The participating youth also shared their general perceptions of the activities using a short feedback survey.

Research in the use of educational robotics in an informal learning environment implies that robotics can increase academic achievement in specific STEM concept areas closely aligned with formal education topics and coursework (Barker & Ansorge, 2007; Barker, Nugent, Grandgenett, & Hampton, 2008; Nourbakhsh et al. 2005). Similarly, past research has indicated that GIS can be used to teach project-based science, environmental education and geography concepts to middle school students (McWilliams & Rooney, 1997). Research also suggests that the use of GIS helps in the development of analytical skills and problem solving (Wanner & Kerski, 1999). Moreover, there is growing interest in examining students’ attitudes towards learning, with recognition that affect surrounds cognition and can moderate learners’ conceptual change (Alsop & Watts, 2003; Koballa & Glynn, 2007). Measuring a student's attitude is not a trivial matter; and much of the robotics literature looking at attitudes relies heavily on subjective secondary observation. For example, Rogers and Portsmore (2004) reported that using robotics as an outreach activity in elementary schools increased confidence and interest in mathematics and science. This conclusion was based on teacher perceptions; the researchers did not directly gather any data from individual youth participants.

There are several instruments that have been developed to assess youth attitudes within science-related contexts. The most widely used is arguably the Scientific Attitude Inventory (SAI) Moore and Sutman (1970). The SAI (I) consisted of a 60 item, four-point Likert-type scale with a series of 12 statements of attitude called “position statements.” These twelve position statements assess six scientific attitudes – three based on intellectual attitudes and three based on emotional attitudes. The six attitudes include: 1) laws of science, 2) scientific explanation, 3) manner of scientific observation, 4) value of scientific activities, 5) usefulness of science to society and 6) student career aspirations. Each scientific attitude has a positive and a negative scale to create the 12 position statements used as potentially measurable constructs. Reliability was measured through the use of the Winer test-retest method using the pre and posttest scores of the control group resulting in a test-retest reliability coefficient of .934 (Moore & Sutman, 1970). Based on the lack of significance using the SAI and other instruments when piloting the project, we elected to develop our own instrument based on specific constructs that originated from our 4-H robotics and GPS/GIS program. Our instrument measures eight scales including: task values in science, mathematics, robotics, and GPS/GIS, problem solving/critical thinking, cooperative learning/teamwork, self efficacy in robotics, and self efficacy in GIS/GPS.
Purpose and Methodology

The purpose of this study was to investigate the short-term impacts of informal summer programs centered on robotics and geospatial technologies in a) promoting STEM learning for youth ages 10-15 and b) positively impacting their attitudes towards STEM. From June to July 2008, 147 youth (112 males and 35 females) in six different camps participated in the summer program. Seventy-five percent of the youth participants self-identified as themselves as Caucasian, 12% as African American, 12% as Hispanic and 1% Asian. The overall mean age for the camps was 12.28 years.

Instrumentation

The instrumentation used for the study consisted of two parts. To measure STEM learning, the project staff developed a 37-item, paper-and-pencil, multiple-choice assessment, covering a variety of topics including computer programming, mathematics, geospatial concepts and engineering/robotics. The assessment was based on a previous 24-item robotics assessment instrument that demonstrated a Cronbach’s alpha reliability coefficient of 0.86 (Barker & Ansorge, 2007). Two experts from Carnegie Mellon University’s Robotics Academy and two engineers from the University of Nebraska-Lincoln Department of Biological Systems Engineering reviewed and validated the assessment instrument’s content. The overall Cronbach’s alpha reliability coefficient of 0.80 was reported for this instrument.

The attitude instrument was also developed by the project staff and was modeled after the Motivated Strategies for Learning Questionnaire (Pintrich, et al., 1991). The questionnaire focuses on the following eight constructs: task value for science, mathematics, robotics and GPS/GIS, problem solving/critical thinking, teamwork cooperative learning/teamwork, self-efficacy in robotics and self-efficacy in GPS/GIS. The task value for science included questions like “It is important to me to learn how to conduct a scientific investigation.” The mathematics task value construct included questions like “It is important for me to learn how to make accurate measurements to help solve mathematical problems.” The robotics construct asked questions like “It is important for me to learn about robotics.” The GPS/GIS construct included questions like “It is important for me to learn about GIS.” In addition, problem solving skills (i.e. “I try new methods to solve a problem when one does not work”) and teamwork constructs (i.e. “I like being part of a team that is trying to solve a problem”) were also explored. Finally the instrument examined self-efficacy in robotics (i.e. “I am confident that I can program a LEGO robot to follow a black line using a light sensor”) and GPS/GIS concepts (i.e. “I am certain that I can log locations of a series of waypoints within a GPS unit”). The overall Cronbach’s alpha reliability coefficient of 0.94 was reported for this administration of the post attitudinal instrument.

Data Collection

The pretest was administered on the first day of the camp prior to the start of program activities. The posttest was administered on the morning of the last day of camp. Administration of the pretest-posttest assessment was conducted in the same manner for each camp. There was no review or targeted considerations of any items included in the assessment instruments between the pre- and posttests.
Data Analysis Procedures

The study used a pretest-posttest quasi-experimental design, with the same assessment acting as both a pretest and posttest in each summer campsite. The learning assessment used a total score for the number of items correct. The primary analysis was a repeated measures t-test for the combined groups by location. The attitudinal instrument used a five-point Likert-type scale with five equaling "strongly agree" and one equaling "strongly disagree." A total score was calculated by summing all 38 items and comparing them using a repeated measures t-test for the entire group and by location.

Results

Learning: On average, youth scored significantly better on the posttest (M = 20.12, SD = 5.60), than the pretest (M = 15.63, SD = 4.52), t(136) = 13.71, p < .001. The results of the repeat measures t-test support the conclusion that the robotics and GPS/GIS summer program supports SET learning as measured by the content test. Results of the pre and posttest score by site are displayed in Table 1.

Table 1
Descriptive Statistics Pre and Posttest

<table>
<thead>
<tr>
<th>Location</th>
<th>Pre-Mean</th>
<th>SD</th>
<th>Post-Mean</th>
<th>SD</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>Omaha North</td>
<td>10.67</td>
<td>2.83</td>
<td>10.53</td>
<td>3.20</td>
<td>15</td>
</tr>
<tr>
<td>Omaha South</td>
<td>12.00</td>
<td>4.44</td>
<td>15.50</td>
<td>5.12</td>
<td>12</td>
</tr>
<tr>
<td>Lincoln</td>
<td>16.87</td>
<td>4.39</td>
<td>20.87</td>
<td>4.37</td>
<td>67</td>
</tr>
<tr>
<td>Ord</td>
<td>17.60</td>
<td>3.78</td>
<td>23.80</td>
<td>2.30</td>
<td>10</td>
</tr>
<tr>
<td>Chadron</td>
<td>17.05</td>
<td>3.70</td>
<td>22.81</td>
<td>2.37</td>
<td>16</td>
</tr>
<tr>
<td>Grand Island</td>
<td>16.53</td>
<td>4.63</td>
<td>23.79</td>
<td>5.58</td>
<td>18</td>
</tr>
</tbody>
</table>

In addition, a one-way analysis of variance was conducted to determine if there was a significant difference in posttest scores by location. Because the assumption of homogeneity of variance was violated the Brown-Forsythe F - ratio is reported. Results indicate a significant difference in posttest scores by location F(5,59.56) = 32, p < .001. Post hoc comparisons using the Dunnett C test indicated significant differences between the North Omaha camp (M=10.67, SD = 2.83) and the other five camps. These results indicate that the North Omaha location did not perform as well on the posttest as the other campsites.

Overall, these results suggest that the 4-H robotics and the geospatial summer camp program is a promising approach for supporting STEM-related learning. To get a better understanding of how individual sites scored on the test; the mean scores are separated by location. See Figure 1. The sites are listed in chronological order with the Omaha North camp first and ending with the Grand Island camp six weeks later.
Similar to the knowledge instrument participants scored significantly higher on the posttest ($M=155.91$, $SD = 20.20$) than on the pretest ($M =147.52$, $SD = 22.03$, $t (133) = -0.09$, $p < .001$) indicating the 4-H robotics and GPS/GIS summer camps have a positive short-term effect on attitudes towards STEM topics. Means and standard deviations for the survey instrument are displayed in Table 2.

In addition, a one-way analysis of variance was conducted to determine if there was a significant difference in posttest scores by location. Results indicate no significant difference in posttest scores by location $F(5,131) = 0.80$, $p =0.55$. Overall, these results suggest that the 4-H robotics and the geospatial summer camp program is a promising approach for supporting STEM-related learning. To get a better understanding of how individual sites scored on the test; the mean scores are separated by location. See Figure 2.

Table 2
Descriptive Statistics Pre and Posttest

<table>
<thead>
<tr>
<th>Location</th>
<th>Pre-Mean</th>
<th>SD</th>
<th>Post-Mean</th>
<th>SD</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>Omaha North</td>
<td>149.17</td>
<td>22.17</td>
<td>152.87</td>
<td>28.338</td>
<td>15</td>
</tr>
<tr>
<td>Omaha South</td>
<td>150.60</td>
<td>18.11</td>
<td>153.45</td>
<td>21.58</td>
<td>11</td>
</tr>
<tr>
<td>Lincoln</td>
<td>149.39</td>
<td>19.65</td>
<td>156.13</td>
<td>20.21</td>
<td>67</td>
</tr>
<tr>
<td>Ord</td>
<td>148.11</td>
<td>30.85</td>
<td>161.67</td>
<td>15.03</td>
<td>9</td>
</tr>
<tr>
<td>Chadron</td>
<td>138.13</td>
<td>25.82</td>
<td>151.06</td>
<td>17.66</td>
<td>16</td>
</tr>
<tr>
<td>Grand Island</td>
<td>145.72</td>
<td>423.14</td>
<td>161.13</td>
<td>15.41</td>
<td>16</td>
</tr>
</tbody>
</table>
The lower pretest score may indicate that this particular group of youth did not have as much knowledge gains from pre to posttest. One plausible explanation for the lack of improvement at the Omaha North site is that chronologically it was the first camp run by the project staff. Therefore, activities and presentation methods were still relatively new, and were still being tested and refined. This can be supported by the apparent increase of the mean paired difference between post and pretest for camps that occurred later in the summer. Another difference with the Omaha North site is that it had a lower mean score on the pretest ($M=10.80$, $SD = 3.22$) compared to other sites. The lower pretest score may indicate that this particular group of youth did not have as much initial experience and therefore, prior knowledge of robotics and geospatial concepts as other groups, perhaps suggesting that at least a minimal level of initial understanding of these topics is needed for students to be fully successful with this level of activities.

Documenting the positive impacts of robotics and GPS/GIS activities on student’s attitudes has been a struggle in past research (Nugent, Barker, & Grandgenett, 2008). Prior to this study the project team piloted two other existing attitude instruments (Scientific Attitude Inventory, Moore & Foy, 1997; Pell & Jarvis, 2001) with nonsignificant pre to post comparisons. Past results suggest that youth have a difficult time in making the connection between STEM concepts and Robotics and GPS/GIS activities. When robotics and GPS/GIS are embedded into a natural experiential learning environment, as opposed to the more traditional direct instruction STEM learning environment, students may become excited about robotic and
GPS/GIS, but not recognize that STEM learning is actually being integrated into the activities. Results have led to curricular revisions, including specific instruction on how specific robotics activities relate to science, engineering, math and technology and the creation of a new attitudinal measurement tool. Additional research is needed to more fully examine each of the eight attitudinal constructs and to examine various trends and the potential interactions of these constructs with various participant demographics.

Overall, results suggest that educational robotics paired with geospatial technologies can positively impact youth conceptual STEM knowledge and associated attitudes. The middle school years are a critical time to foster improved STEM perceptions and attitudes and to lay the groundwork for more advanced math and science courses in high school. The use of robotics and geospatial technologies in an informal educational environment appears to be an effective way to support youth STEM cognitive and attitudinal development.

References


Acknowledgements
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Service Learning Through Disaster Relief

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Service Learning Through Disaster Relief

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Abstract: The Rock County 4-H Disaster Relief Committee raised $1,550 to aid tsunami victims in Sri Lanka and then turned its attention to Hurricane Katrina relief efforts. Thirty-one 4-H youth participated in a service learning trip to the South with the objectives of helping hurricane victims, learning about new cultures and achieving personal growth during three days of service projects in Louisiana and Mississippi. Their written reflections and other evaluative measures revealed they learned about southern culture, gained a greater appreciation for their lives, gained self confidence and developed a desire to help others more often. The trip was a valuable developmental experience for the youth, and information from the trip could be utilized to create similar experiences based on service learning. This article provides an overview of the trip and describes the evaluation methods used to measure learning and assess personal growth.

Introduction

Through participation in community service projects, 4-H youth develop valuable life skills such as leadership, cooperation and self-awareness. They apply those skills in their daily lives and become productive, caring citizens of their communities.

Perhaps even more valuable than participation in community service is service learning. According to the National Service-Learning Clearinghouse, “Service-learning is a form of experiential education where learning occurs through a cycle of action and reflection as students work with others...to achieve real objectives for the community and deeper understanding and skills for themselves” (National Service-Learning Clearinghouse, 2001). The formation of the 4-H Disaster Relief Committee and the service learning trip to Louisiana were the first efforts intentionally focused on service learning in the Rock County 4-H program.

Shortly after the December 2004 tsunami, Rock County 4-H hosted a presentation by a Sri Lankan family who was directly affected by that disaster. As a result, the Rock County 4-H
Disaster Relief Committee was formed. During fundraising events coordinated by the youth and adults on the Rock County 4-H Disaster Relief Committee, a total of $1,550 was raised and donated to the Salvation Army. That donation was designated to build 1½ homes in Sri Lanka.

After Hurricane Katrina devastated the southern United States in August 2005, the committee focused on relief efforts for those disaster victims. They felt they had addressed the "I pledge...my hands to larger service...for my world" portion of the 4-H pledge through their fundraising for Sri Lanka. They now wanted to do something meaningful "...for my country."

Specifically, the youth on the committee expressed interest in a hands-on relief project for victims of Hurricane Katrina. Through my personal contact with a high school teacher in Franklinton, Louisiana, the youth learned of the damage sustained in that area. Culturally, Franklinton is quite different from towns in Rock County, which presented an opportunity for the Rock County 4-H youth to learn about southern culture as well as develop life skills through a service learning trip to the South.

**Program Design**

The trip was designed as a service learning experience according to the four main elements of service learning as defined by the Wisconsin Department of Public Instruction (Potts, 2001). Those elements are:

1. **Youth leadership.** The 4-H members initiated the trip and were involved in some of the decision making.
2. **Community need.** The specific local needs were well established through personal contacts in the area.
3. **Curricular connection.** Participants received informal instruction on southern culture.
4. **Reflection and evaluation.** A pre-post test on cultural differences was administered and a variety of reflection activities utilized during and after the trip.

The Rock County 4-H Disaster Relief Committee defined the objectives for the trip, determined the budget and in-kind donation needs, and developed a fundraising plan. The trip was entirely funded through donations obtained by the committee and trip participants. A total of $10,000 was raised for transportation, meals and supplies. In-kind donations included bottled water, snacks, t-shirts, sunscreen, insect repellent, disposable cameras, work gloves and shovels.

A total of 31 youth in grades 8-13 participated in the service learning trip in June 2006. The five-day experience included two days of travel and three days of service projects. Two days were spent planting trees and rebuilding shelters at a Camp Fire USA youth camp in Louisiana. One day was spent helping individual homeowners clean up debris and paint newly rebuilt homes in Biloxi, Mississippi. The Rock County 4-H group was housed free of charge at a Louisiana State University (LSU) Forestry Camp. Local LSU Extension staff, 4-H/FFA members and their parents prepared meals and provided educational and recreational activities in the evenings.

The primary evaluation method used for the service learning experience was reflection. Reflection is effective because it “...gives meaning to the experience...can create a sense of accomplishment...fosters life-long learning skills...clarifies values... acknowledges skills gained and builds confidence” (National Youth Leadership Council, 2005). As not all youth respond...
positively to all types of reflection activities, a variety of reflection activities were carefully planned and implemented during and after the trip. Refer to Appendix A for a description of reflection activities utilized.

**Program Impacts and Success**

The 31 youth who participated in the service learning trip planted over 1,500 pine and oak tree seedlings at Camp Teca Towazi in Louisiana. They rebuilt benches in several shelters at the camp. Those efforts will directly benefit the youth campers, counselors and adult staff who utilize that facility for day camps each year and are in need of shaded areas in which to conduct their programs.

The leadership of a church in Biloxi, Mississippi identified specific neighborhoods and homeowners who had requested help with clean up and rebuilding. Divided into three smaller groups, the trip participants assisted a total of six homeowners in Biloxi with debris clean up, yard work and house painting.

Prior to the trip, the youth participated in an orientation that included a pre-test on various aspects of southern culture. A post-test was administered at the end of the trip. This pre-post test was the only quantitative method used to assess learning. The test scores increased by an average of 13.3% even though a few of the aspects were overlooked during the trip. A breakdown of the increase in scores for questions related to specific aspects of culture reflects which aspects were given more attention (Table 1).

<table>
<thead>
<tr>
<th>ASPECT OF SOUTHERN CULTURE</th>
<th>% INCREASE IN TEST SCORES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Climate</td>
<td>26.4</td>
</tr>
<tr>
<td>Demographics</td>
<td>20.0</td>
</tr>
<tr>
<td>History</td>
<td>19.1</td>
</tr>
<tr>
<td>Industry/Agriculture</td>
<td>11.9</td>
</tr>
<tr>
<td>Geography</td>
<td>5.7</td>
</tr>
</tbody>
</table>

Most of the learning related to southern culture occurred through informal discussions on topics in which the youth were most interested. Much information was shared by local residents who interacted with the trip participants on a daily basis, and this daily interaction proved to be the most effective method of teaching the youth about southern culture. As the trip progressed emphasis was shifted from learning about cultural differences to enhancing personal growth through discussion and reflection.

The service learning trip participants expressed the significance of their experiences very effectively through numerous reflection activities during and after the trip. The written reflection pieces included the journal entries, county award forms completed ten weeks after the trip and six-month follow-up evaluations for a total of 42 written pieces from 31 youth. In an effort to quantify some indicators of personal growth, the number of times a key concept or phrase was mentioned in a written reflection piece was recorded (Table 2). It was also noted...
how many different youth mentioned a specific concept or phrase, as some youth referred to the same concept more than once.

### Table 2
Recurrence of key concepts or phrases in written reflection pieces

<table>
<thead>
<tr>
<th>KEY CONCEPT OR PHRASE</th>
<th># OF TIMES MENTIONED (N = 42)</th>
<th># OF YOUTH RESPONDENTS (N = 31)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gained appreciation for things in my life; not going to take so much for granted from now on</td>
<td>16 (38.1%)</td>
<td>12 (38.7%)</td>
</tr>
<tr>
<td>The experience changed my life</td>
<td>11 (26.2%)</td>
<td>9 (29.0%)</td>
</tr>
<tr>
<td>It was rewarding/it felt good to help others</td>
<td>10 (23.8%)</td>
<td>9 (29.0%)</td>
</tr>
<tr>
<td>Want to help more, either in the South or at home</td>
<td>8 (19.0%)</td>
<td>8 (25.8%)</td>
</tr>
<tr>
<td>Learned about cooperation/responsibility; gained self-confidence</td>
<td>8 (19.0%)</td>
<td>6 (19.4%)</td>
</tr>
<tr>
<td>Learned about life in the South</td>
<td>6 (14.3%)</td>
<td>6 (19.4%)</td>
</tr>
</tbody>
</table>

### Discussion and Implications

It is important to take age and maturity level into account when involving youth in service learning activities. The 8th grade youth in this project had a more difficult time physically exerting themselves in the heat and humidity than the older youth. They were also more difficult to motivate.

Utilizing reflection activities as a method for assessing personal growth can be very effective if properly planned and implemented. However, it does take a great deal of time to read and analyze the qualitative data obtained through such activities.

The nature of the experience’s effect on the youth was fairly consistent, but the depth of that effect varied greatly among individuals. The 8th and 9th grade youth tended to use phrases such as “I had fun and learned a lot” while the older youth expressed much deeper insights. They articulated the effect of the experience by describing specific skills they utilized and learned to appreciate. They used such terms as responsibility, acceptance and self-confidence in relating what they learned about themselves.

The service learning experience does not end when the trip is over. It is necessary to maintain a relationship with the youth to insure their learning is applied to projects addressing local community needs.

Documenting the personal growth of program participants is an ongoing process. Continued evaluative efforts are necessary to determine if the program experience contributed toward changes in the participants’ attitudes and behaviors.
References


Appendix A

Evaluation Plan – Reflection Activities

Activity: Journals

Description:
Each participant was provided with a composition book at the beginning of the trip. The book was labeled with the participant’s name and a list of prompt questions was attached to the inside front cover.

Instructions:
Participants were asked to write their personal thoughts and feelings in the book on a daily basis. They were encouraged to use the prompt questions if they felt they needed some guidance in what to write. Journal writing was especially encouraged during time designated at the end of each day. Written and verbal directions clarified that the journals would be collected and read by the faculty member, then returned to the participants.

Notes:
As the most structured of the reflection activities, journaling definitely yielded the most valuable results.

Activity: Graffiti Wall

Description:
Large sheets of flipchart paper were taped to the wall in the main room of the lodging facility. A variety of markers were available at all times.

Instructions:
Participants were told they could write personal reflections on the paper at any time. The reflections could be read by everyone but would remain anonymous unless others observed who wrote them.

Notes:
Effectiveness could have been improved by providing more specific instructions and designating a specific time each day for this activity.

Activity: Suggestion Box

Description:
A covered shoebox, slips of paper and markers were placed on a table in the main room of the lodging facility.

Instructions:
Participants were told they could write personal reflections on slips of paper and place them in the box at any time. The reflections would be anonymous and would only be read by the faculty member.
Notes:
As with the Graffiti Wall, the effectiveness could have been improved with more instructions and a designated time each day.

Activity: Group Discussions

Description:
The entire group was convened at the end of each day for discussions facilitated by the faculty member. If time and the situation allowed, such discussions were also held during breaks at the service project sites.

Instructions:
The faculty member used the journal prompt questions as a guide for group discussions but encouraged discussion beyond those questions. The faculty member kept written notes of all group discussions. The other adult chaperones helped with note taking so the faculty member could concentrate on facilitation.

Notes:
Group discussions were utilized primarily to assess participants’ personal growth. Some group discussion time could also have been focused on how the participants’ experiences related to southern culture and what they were learning about cultural differences.

Activity: Six-month Follow-up Tool

Description:
A reflection tool of four open-ended questions was mailed to participants approximately six months after the trip.

Instructions:
Participants were asked for their complete and thoughtful responses. They were requested to e-mail responses to the faculty member or mail the hard copy back in the enclosed envelope. Hard copy responses could remain anonymous.

Notes:
Response rate could have been improved by revising the format from all open-ended questions to different types of questions, or by giving the tool to those participants in attendance at various county 4-H meetings.
Using an Active Learning Approach (the 4-H model) to Stimulate Social Change: Youth and Community Development in the Republic of Kyrgyzstan

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Using an Active Learning Approach (the 4-H model) to Stimulate Social Change: Youth and Community Development in the Republic of Kyrgyzstan

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Abstract: As Kyrgyzstan recovers from the collapse of the Soviet Union, the youth of this Newly Independent State (NIS) face troubling times. Poverty has become all too familiar throughout the country; its people, including youth, are losing hope and question their ability to be productive members of society (Lines & Kock, 2004). Kyrgyzstan’s future leaders – like all nations - are found among its youth of today. Therefore, it behooves the government and citizens of Kyrgyzstan to develop youth centers designed to enhance the skills young people need to succeed now and in the future.

This paper describes a program designed to teach Kyrgyz youth and adults teamwork, and civic responsibility through experiential learning activities. The paper outlines the steps taken and results derived from the hands-on trainings provided to the participants in one location in Kyrgyzstan. Findings from this study may have implications for other international youth development projects.

Introduction

Central Asian youth are clearly disadvantaged in many aspects of life compared to their parents’ generation (Silova, Johnson, & Heyneman, 2007). As Kyrgyzstan recovers from the collapse of the Soviet Union, the youth of this Newly Independent State (NIS) face troubling times. Poverty has become all too familiar throughout the country; its people, including youth, are losing hope and question their ability to be productive members of society (Lines & Kock, 2004). Kyrgyzstan’s future leaders – like all nations - are found among its youth of today. As asserted by the United Nations Children’s Fund (UNICEF) organization, “adolescents today are the men and women of tomorrow” (UNICEF, 2005). Therefore, it behooves the government and citizens
of Kyrgyzstan to develop youth centers designed to enhance the skills young people need to succeed now and in the future.

As is the situation in most post-Soviet countries, public investment in Kyrgyz youth and more particularly youth in rural settings, have been marginalized during the on-going transition. The new political, social, and economic paradigm of democracy, personal responsibility and free-market economics has left youth development behind (Lines & Kock, 2004). The years of communism and precarious transition thereafter have strapped the NIS states with social and economic challenges (Babajanian, Freizer, & Stevens, 2005). The nation needs to invest in its’ rural youth, not just its’ urban youth, through educational opportunities and centers that foster youth adult partnerships (Gregoire, 2004). Young people in rural communities need meaningful educational experiences that will enhance their capabilities to work together to pursue their own interests and that of their communities (Peters, 2002).

Community organizations in rural or disadvantaged regions that provide development activities play a vital role in social change (Jackson & Boateng, 2006). These youth centers would promote social development at the grassroots level. Work at this level has become a priority in the developing world (Earle, 2005). Earle also suggests that much of this has to do with changing global politics and the realignment of development. Many developing countries lack the financial and human recources to promote rural community development. Therefore, collective self-help has gained popularity as a way to address the needs of poor communities (Earle, 2005).

**Problem Statement**

In the Soviet Union, any independent civil organization was considered “illegal or semi legal” and was a threat to the nation’s political system (Babajanian, 2005). Earl (2005) supports this by stating that in South Kyrgyzstan collective voluntary mobilization was fairly rare, communities depended on government for support. However, after the collapse of the Soviet system, many Kyrgyz people, including youth, had very little use for government programs; they were preoccupied with providing for themselves and their families (Eurasianet, 2005). Therefore, the need to develop community-based youth educational programs that are driven by local community members and not part of the government became a priority. These organizations became an intermediary between the state and private life (Banajanian, Freizer, & Stevens, 2005).

Countries that do not educate their youth can not achieve sustainable development (UNICEF, 2005). One way to address this need is the development of community youth centers managed by youth and adults that provide leadership opportunities to community members. However, centers of this type could be perceived as undermining the traditional Kyrgyzstan practices of the exclusion of women and young people in the decision-making process for a social unit (Banajanian, Freizer, & Stevens, 2005). Community members (elders) and faculty of the College of Mining in Kyzyl-Kiya, Kyrgyzstan expressed interest to local Agricultural Cooperative Development International/Volunteers in Overseas Cooperative Assistance, (ACDI/VOCA) Community Action Investment Program (CAIP) employees about building a community-based center for local youth. Earle (2005) pointed out that dialogue with community members before projects are started will add to the probability of successful outcomes.
Purpose of the Program

Before monies would be spent (funded by the United States Agency for International Development [USAID]) on the construction and refurbishing of the community center, located at the College of Mining, four issues needed to be addressed:

1) community members needed to learn to work together as a team instead of individuals;
2) the center’s purpose (vision and mission statement) needed to be written;
3) an organizational hierarchy or board of officers needed to be developed; and,
4) a set of working by-laws or “rules of the game” (Huebner, 1998) for board members to follow needed to be created.

The management team of the ACDI/VOCA CAIP program perceived these four issues as important for the sustainability of community youth centers.

ACDI/VOCA staff provided group facilitation and team-building trainings to local youth and adults who expressed an interest in the design and management of the proposed center. The trainings were designed to create an atmosphere of teamwork, leadership, and character development. For young people, leadership includes opportunities for caring relationships with adults and community engagement (Jacob, Wertlieb, & Lerner, 2003).

To accomplish the team-building issue, experiential learning methodology, such as ‘Challenge’ activities and character-development education was implemented to build relationships, based on trust and respect, between participants through basic hands-on activities. The “mistrust” the volunteers (participants) demonstrated towards belonging to community organizations and each other was a by-product of past Soviet rule according to Banajanian (2005).

This is not new phenomenon; historically other countries including the United States, have dealt with issues of that nature. A century ago, rural Americans were struggling with some of those very issues. For example, under the direction of President Theodore Roosevelt the Commission on Country Life stated: “It is the greatest consequence that people of the open country should learn to work together, not only for the purpose of forwarding their economic interests and competing with other men who are organizing, but also to develop themselves and to establish an effective community spirit” (Commission on Country Life, 1909/1911 p. 128).

Once volunteers (participants) had completed four days of “Experiential Learning” and character education training encompassing teamwork, leadership, and responsibility, work on the second, third and fourth issues (i.e., writing a vision and mission statement, officers, and by-laws) began.

Data Sources and Methods

In the fall/winter of 2004, ACDI/VOCA implemented a community development project in the rural community of Kyzyl Kiya, Kyrgyzstan. The community of Kyzyl Kiya provided 25 citizens who expressed interest in the development of a youth center in their community. The participants, 16 women and 9 males, ranging in age from 17 to 39, had some interaction with each other through school or college but they showed very little desire to work together.

A “process approach” was used to build on the skills the participants needed for the design of the infrastructure of the center (Earle, 2005). Earle stated that a process approach empowers
people and social benefits are placed before installation of infrastructure. Observations by the researcher during class trainings (Smith & Lincoln, 1984) and creation of the center’s vision and mission statement, board officers, and by-laws served as source of data for qualitative evaluation of project.

At no time during the training was a participant mandated to participate in any activities; participation was completely voluntary (Washington State University, 2000). The majority of participants were involved in all activities. Only one chose not to participate in an activity (i.e., the trust walk). That individual did not feel comfortable being blindfolded. Because of the program’s focus on participants’ experiences and educational outcomes, a narrative evaluation was used to explain the qualitative research results (Short, 1991). According to Short, John Elliot defined this approach as action research: “the study of a social situation with a view to improving the quality of the action within it” (p. 311). McKernan restated this kind of reflective inquiry as “practical action research” (Short, p. 312).

Findings and Conclusions

At the completion of four days of training, the first goal, creation of a vision and mission statement for the Center, was started. Through classroom discussion, it was concluded that more than 70% percent of the participants had never heard of a vision or mission statement, and none had ever had the opportunity to create one. Therefore, a brief outline or discussion on the purpose of each took place. Once the participants gained a better understanding of how these statements would “frame” the purpose of the youth center, focused group dialog began. The first aspect of this part of the project was the creation of a vision statement. The researcher believed that by implementing a collective decision-making process (Toness, 2001), participants could create a vision of what they hoped the center would do for the community, and then the mission statement would come more easily.

Through a day of group discussion and student interaction, concepts started to surface and participants began to build on one another’s ideas (Bruening, Lopez, McCormick, & Dominguez, 2002). At the end of the third day, a vision statement was completed. The next step was to develop a mission statement for the center. By this time, participants were becoming more comfortable with each other. This was noticed through their body gestures, the fact that participants began sitting in different seats, and because several participants began to lead discussions about the mission statement.

After two days of consensus building and numerous revisions, the Center’s mission statement was completed. Following further discussion, participants voted to combine the vision and mission statements into one document. According to Jackson and Boateng (2006), that indicated an understanding of democracy and a sign of “social change” (Goal 1). The participants stated that they believed a single document would work best for the center. This combining of the documents led the researcher to hypothesize that community ownership of the Center was taking shape.

Goal 1. Combined Vision/Mission Statement of Kyzyl Kiya Community Youth Center

“This youth center was established to help develop youth to be qualified and competent citizens of Kyrgyzstan through information, education and the promotion of healthy living.”
Participants spent the next five days working on by-laws that would serve as rules for governing the Center. The foundation of any organization is a constitution and by-laws (Jordan, 1999). Through group discussions concerning what type of a management structure would best serve the Center, participants decided that there should be a “governing board” system modeled after the U.S. 4-H Council approach. This consisted of a president, vice-president, secretary, treasurer and three ex-officio members consisting of an elected government official, international non-governmental organization (NGO) representative, and a college of mining representative.

During the next step in the process, participants worked through voting issues, length of board members’ terms, and their duties. Unfortunately, the current Kyrgyz government was perceived as corrupt (Eurasianet, 2005) and provided poor examples and little valuable guidance as to the functions of governing board. After a brief discussion about roles and responsibilities of American 4-H volunteer councils, participants began to describe the anticipated functions of each board member for the proposed Center (Goal 2).

**Goal 2. Board Members’ Titles and Responsibilities**

- **President:** This officer will run board meetings, give direction to youth center manager (as described by board) and be spokesperson for the youth center/NGO.
- **Vice President:** This officer will preside during board meetings when president is absent. The main function of this officer is to serve as manager of the youth center, providing direction to coordinators (e.g., education and sports) as directed from the board.
- **Secretary:** This officer is responsible for minutes of meetings, any correspondence to board and communication to members and the public.
- **Treasurer:** This officer is accountable for funds generated by the youth center/NGO; for any money to be spent, it must be voted on by the board. A receipt book or other accounting program will be used. The expenditures and funds must have been approved by the board and a receipt must have two board members’ signatures: President and Treasurer or that of Vice President when either of the other officers is unavailable.

By-laws or governing rules for voting was the final step or third goal in development of a board for the Youth Center. Some participants expressed concerns about how to create a system that would treat each member equally and who could be a member of the board. Through volunteers’ participation in all levels of the decision-making process (Toness, 2001), participants designed rules for elections and voting rights of board members (Goal 3).

**Goal 3. By-Laws for Youth Center Board**

- **Board members will serve a one or two year term. Selection of members serving a one-year term will be decided by random drawing after second year of operation. (For the first two years, the board will remain the same; after the second year, the rotational terms will take effect.)**
- **Members of the board may serve two consecutive terms then must sit out for a period of one year before running for the board again. If a board seat becomes vacant that opening will be filled (through voting) for the remainder of that term.**
- **Eligible candidates for the board will be youth members of the Youth Center or the**
parents of those youth. Winning seats to the board will be candidate(s) with most votes cast by Youth Center members and their parents. Candidates seeking election to the board will be publicized in the Youth Center's newsletter.

d) There will be 12 members of the board excluding the three ex-officio members.

e) Election to the board will be held in January of each year.

f) All issues decided by the board must be voted on by the Board members present at any meeting. For an issue to pass, it must receive a simple majority of the votes (51%). By-law changes: Changes to the By-Laws may be made only at first meeting of the new calendar year and 90% (11 members) of voting board members must be present. The change must receive 75% (9 members) of the board members’ votes.

These activities enhanced participants’ knowledge and understanding concerning community empowerment and civic responsibility as it related to building capacity in their own community. By youth working through this type of service-learning activity, the likelihood of them becoming community leaders who take on the responsibility for solving community problems should increase (Des Marais, Yang, & Faranehkia, 2000).

**Implications, Discussion and Educational Importance**

As the post-Soviet system changes and Newly Independent States (NIS) move toward their communities being governed democratically, the need for youth and adult development programs that instill a spirit of volunteerism and service increases. This was true a century ago in the United States when Cooperative Extension was authorized by Congress through the passing of the 1914 Smith-Lever Act. Extension served as the driving force to usher in new ideas that helped rural people. This is also true today. By teaching citizens of foreign countries the importance of the development of social organizations that lead to positive change, those citizens may motivate other countries to move closer to a democratic process.

For many years, the United States Agency for International Development (USAID) and the United States Department of Agriculture Foreign Agricultural Service (USDA/FAS) have sought out universities for consultants. More specifically, they have looked to land-grant universities and the Cooperative Extension Service (Duffy, Toness & Christiansen, 1998; Finley & Price, 1994) when filling positions for development projects world-wide. Now with the renewed motivation from the United States Department of Agriculture and the United States Agency for International Development (USDA, 2007) for Extension faculty to work in foreign countries, the processes mentioned in this paper may help other Extension professionals working on international assignments design programs that may further the democratic process and help people from other countries reach their desired outcomes of social change.

**Recommendations**

As more community-driven youth and adult programs are implemented in Kyrgyzstan, other former post-Soviet countries, and the world, people in those countries may become more aware of the world as a global society. The purpose of community organizations is to build relationships among groups and individuals that enhance the ability of a society to work together in creating organizations that benefit the common good of members in that community (Sanderson, & Polson, 1939). According to Banajanian, Freizer and Stevens (2005), historically, there have been community self-help groups termed *ashara* (in Kyrgyzstan) throughout Central
Asia that still have meaning today. The approach described in this study may have complemented that social construct.

It is important for young people to understand the process in which they live and identify with cultural and social environments (Banajanian, 2005). Through this process, youth and adult participants should have gained the social-cultural tools necessary to become a vital and contributing voice in their communities. Success of the development of this community program should enhance the confidence of community members to organize other projects (Banajanian, Freizer, & Stevens, 2005) that would contribute to the development and welfare of their local societies. However, the ultimate question becomes whether revitalized youth educational centers can create sustainable social cohesion and human development throughout Kyrgyzstan and the broader region (Silova, Johnson, & Heyneman, 2007). Providing participants the opportunity to work through differences and their willingness to democratically “vote” on issues indicated the effectiveness of the youth center development project.

This study may provide others working in community development and democracy building a roadmap for developing sustainable community-driven programs that benefit the people living in other parts of the world. By following the steps explained in this study, and involving members of the community where they are working the opportunity to work through the process, development workers may emulate the outcome of this community-driven project. However, it is important to remember there is no cookie-cutter formula that will work in every community. Development workers need to be flexible and do what is needed in the community they are serving.

References


What’s Going On?
Developing Program Theory for Evaluation

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What’s Going On?
Developing Program Theory for Evaluation

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Abstract: This paper outlines the process undertaken to develop a program logic model into a program theory that could be tested through a large scale evaluation. Logic models are widely promoted to establish program intention and outcomes, thus setting the stage for effective program evaluation. However, the causal links in program logic models are often assumptive in nature, and lack the specificity of conditions needed in order for the program to achieve its planned success. The authors share a process of observation and focus groups that allowed them to probe some of the links of the program logic model. The result presented is an “enhanced” logic model that reveals possible moderators of program success, which leads to the development of evaluation questions that will be used in a subsequent large-scale evaluation. The value of using an enhanced logic model for program evaluation leading to program policy changes and improvement is underscored.

Introduction

The 4-H program is a positive youth development program that is part of the educational offerings of the Extension services of Land-Grant Universities across the county. In 2008, almost 6 million youth participated in one or more 4-H programs in the United States (Research, Education, & Economics Information System, 2009). One of the most popular 4-H projects is the horse project, in which young people learn about horses and their proper care and training. Youth participants in the 4-H horse project also have the opportunity to compete with their horse at 4-H fairs and other competitions.

Because of the popularity of the 4-H horse project we were interested in developing a program evaluation to investigate the impact of participation on youth. Very little previous research has been done on this topic, however, and therefore little theoretical information was available to
guide our investigation. In addition, anecdotal information that seemed consistent from state to state led us to believe that there may be some unique benefits and challenges within the 4-H horse program that could affect the ultimate impact of the program on youth. This paper outlines the process of using focus groups to develop a basic program logic model into more detailed program theory, which in turn allowed for the development of critical questions to be used in the program evaluation.

**Review of the Literature**

The research base for positive youth development (PYD) has developed significantly in recent years, and current research is revealing the particularly strong influence that the 4-H Youth Development program has on the positive development of youth. Many 4-H programs develop and use basic logic models that articulate the elements that are necessary for the program’s success (cf Rennekamp & Arnold, 2006; Figure 1). These elements include:

1. the resources, including volunteers, that make the program possible;
2. the youth who participate and the types of programs in which they are engaged;
3. the program’s essential elements, which ensure that programs provide opportunities for belonging, mastery, independence, and generosity (Kress, 2004); and
4. the content of the programs (often called a 4-H project) and the life skills that are developed through learning the content, such as leadership, responsibility, and teamwork.

When the aforementioned aspects of the model are in place, a predicted increase in the outcomes of PYD takes place. These important outcomes are commonly known as the five “C’s” of PYD: confidence, competence, character, caring, and connection (Lerner & Lerner, 2006; Roth & Brooks-Gunn, 2004). Long-term, developing PYD outcomes leads to a successful transition to adulthood, marked by positive family and social relationships, economic self-sufficiency, and positive contributions to community (Gambone & Connell, 2004).

**Figure 1**

4-H Program Model

![Diagram of 4-H Program Model]

*From Logic Models to Program Theory*

The development of program logic models, such as the one described above, has been emphasized in recent years as a primary step in effective program evaluation (Frechtling, 2007; Knowlton & Phillips, 2009; Rogers, Petroscino, Huebner, & Hacsi, 2000). The need for program
developers to understand a program’s intent and articulate it in a clear manner underscores the popularity of teaching logic modeling as a first step in building evaluation capacity (Arnold, 2006). The purpose of program logic models is to articulate the causal connections between the resources that are invested in a program, what is done with those resources, who is reached as a result of the investment, and what happens in terms of short, medium, and long-term outcomes. The “logical” connections that link the elements of a logic model are often assumptive in nature, and, when used to illustrate program theory, have a distinctly predictive intention (McLaughlin & Jordan, 2004). As Chen (2004) points out, the assumptions about the causal links that describe how a program should work are crucial because the success the program’s “effectiveness depends on their validity” (p. 17). One of the key aspects of program theory is that it moves beyond identifying the causal elements, to identifying the actions that are needed to link program elements (Braverman & Engle, 2009; Chen, 2004).

Despite their popularity in program design, logic models are often overly generalized and fall short of theoretical because there is not enough specificity in the model to understand the required conditions and actions that connect program inputs, outputs, and outcomes. One purpose of program evaluation is to test the model’s theory and predictability, and in order to do so, logic models need to be prepared with a greater focus on the actions supporting the causal links. As Rossi, Lipsey, and Freeman (2004) state, the basic question underlying most program evaluation is: “is what’s supposed to be happening actually happening?” (p. 93).

Articulating a program’s theory is even more complex when multiple programs are conducted under the umbrella of a more general logic model. This is often the case in 4-H youth development where the participants, content, setting, and facilitators (often adult volunteers) can vary considerably between program sites and the content being learned.

In addition to being known for its popularity the 4-H horse program also stands out because of its unique “culture.” County 4-H agents (professional youth development educators who manage the 4-H program at the local level) often report that adult volunteers in the 4-H horse program are passionate, committed, and dedicated to working with youth and their horses. At the same time, 4-H agents often report experiencing the greatest level of conflict within their programs with 4-H horse leaders. Because of the consistent anecdotal information regarding conflict within 4-H horse programs, we wondered about the potential negative impact the conflict could have on the program outcomes. Going further, we wondered what specific actions are necessary in light of potential conflict that could possibly moderate any negative effect of conflict, thus ensuring better program effectiveness. These questions, all variations of the basic program evaluation question posed by Rossi, Lipsey, & Freeman (2004), also highlight the reality that program theories are rarely as simple and linear as basic program logic models might suggest. Rather, actual program theory is more likely to be a complex web of events, influences, actions, interactions, and outcomes. Teasing out these relationships becomes an important aspect of more sophisticated program evaluation.

As the practice of program evaluation in Extension becomes more experienced, so has the thirst for more complex understanding of program impact and outcomes. While the basic evaluation question remains the same, understanding if a program is working is no longer fully satisfying in light of the recognized variations among 4-H programs. More and more, evaluation questions are focused on how a program is working, because it is in understanding the how that programs can reap the most benefit in using evaluation results to inform program policy and improvement.
The answer to the “how” question can sometimes be found in research and policy literature related to the issue the program is attempting to address. Some may argue that programs should not be developed without a complete understanding of the research supporting them, but practice shows that programs often get underway first, and the theory comes later. In addition, as McLaughlin and Jordan (2004) point out, evaluation results can be used to shape program theory by providing explanations of causal relationships that are observed during the evaluation. In some situations, one may even employ specific, strategic methods designed to elicit latent program theory (Braverman & Engle, 2009; Leeuw, 2003).

The stated mission of Extension is to deliver research-based educational programming to the public (Franz & Townsend, 2008). As such, it appears that 4-H programming could be a hallmark of theory-driven programming. Indeed, there are many examples of this being the case, but in other instances the research base and theory is weak or not defined at all. At its broadest level, the 4-H program logic model was developed based on research related to best practices in positive youth development. As a theoretical model, however, it lacks detail related to the actions needed to ensure its success. At a more specific level, such as how the program may unfold for youth engaged with differing project content, the research base may be unknown, or even non-existent. Such is the case with the 4-H horse project. Research on the impact of horses on youth is minimal, and most of what has been done has focused on the use of horses in therapeutic riding programs (cf. Ewing, MacDonald, Taylor, & Bowers, 2007; Schultz, Remick-Barlow, & Robbins, 2007), with little or no quality research focusing on the benefits for youth who are not necessarily at risk for problems. Two exceptions are Lambarth’s (2008) study of five 4-H alumna and their horses and Slocum’s (2004) study of the impact of participation in 4-H horse events on the development of youth life skills. Despite the fact that the horse project is one of the most popular 4-H programs, we have little evidence to support its theoretical model.

What is going on? Focusing on the connections within a program logic model
The popularity of the 4-H horse program, combined with anecdotal evidence of its unique culture, piqued our interest in understanding the impact of participation on youth. We had reached a point in our development of evaluation capacity and organizational learning where we longed for something more; more detail and more understanding about how our programs work and why. In their multidisciplinary model of evaluation capacity building Preskill and Boyle (2008) outline the synergistic relationship between sustainable evaluation capacity building, sustainable evaluation practice, and the moderating effects of organizational leadership, culture, systems and communication. As an organization, 4-H has gained tremendous ground in developing evaluation capacity (Arnold, 2006) and continues to address many of the elements for sustainable evaluation practice (Preskill & Boyle, 2008). Along the way, we conducted many program evaluations based on the assumption that our program logic model was complete and accurate. However, we knew that the model (see Figure 1) was neither complete nor accurate, in that the connections between the model elements were largely unarticulated, specifically lacking detail on conditions and actions that promote success. In addition, even where more specificity was provided, there was little evidence to support how accurate the connections actually were. As Preskill and Boyle (2008) point out, one of the moderating elements for organizational learning includes leadership. The prospect of evaluating the 4-H horse program provided the opportunity for organizational leaders to press further into a more detailed understanding of program theory, which, in turn, would inform local 4-H educators and
stakeholders, thus increasing organizational learning through the use of more detailed program knowledge.

With little theoretical knowledge to guide us, we decided to undertake a research project with the purpose of developing a more detailed program theory about the 4-H horse program, from which a program evaluation could be developed. The research was conducted in two phases. The first was a series of observations at county-based 4-H horse fairs, followed by three focus groups later in the year. The goal of this work was to arrive at a more complete logic model for the 4-H horse program, highlighted by some of the actions that are necessary for the program to be effective. This enhanced program model would in turn be used as the basis for a large scale evaluation on the impact of the 4-H horse program on youth participants.

**Methods**

*Using qualitative methods and focus groups*

Qualitative methods are often able to break into the “black box” and describe the “how” and processes of theory related to practice (Zussman, 2004). Qualitative research strives to find creative ways of linking research to constructs. According to Barbour (2007), focus groups are an effective method for understanding the process of how outcomes are reached. “Focused” group interviewing as a data collection method has its beginning in the 1940’s (Merten & Kendall, 1946). After some initial interest, the method largely disappeared as texts related to its use went out of print (Berg, 2004). Focus groups remained popular in marketing research, however, and by the late 1980’s, made their way back to the social science realm as “group interviewing” methods (Berg, 2004).

In social science, focus groups are helpful as an independent research method, for informing various aspects of an in-depth study, such as the development of a questionnaire, and for multi-method research studies. The present study used focus groups to elucidate processes linked to the 4-H horse program as it relates to the 4-H logic model and uncover underlying theories to be tested in follow-up research about to understand the mechanisms that may impede or facilitate PYD within the 4-H horse program.

*Focus groups and participants*

Three focus groups were held across the state in both rural and urban sites, representing large and small horse programs. Previous research on focus groups indicates that three to five groups are adequate for saturation, though the exact number may depend on the context and research goals (Morgan, 1997). Each group consisted of eight to eleven participants; all participants were female, which is representative of the 4-H horse program in general. A total of 20 adult volunteer leaders and nine youth members of the 4-H horse program participated in the focus groups.

Leaders had been volunteering with the 4-H horse program for varying amounts of time. Three leaders reported being a leader for one year, five reported being a leader for two to four years, five reported being a leader for five to eight years; four reported being a leader for nine to 13 years, and two reported being a leader for 20 years (one adult leader did not report years in the program). Between two and four youth members were in each focus group. Youth members were between the ages of 12 and 16 (M= 15.3). Among the youth members, two had participated in the program for three years, six had participated for five to eight years, and one had participated for nine years (see Table 1).
### Table 1
Focus Group Participant Characteristics

<table>
<thead>
<tr>
<th></th>
<th>Youth Members</th>
<th>Leaders</th>
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<tbody>
<tr>
<td>Number of Participants</td>
<td>9</td>
<td>20</td>
</tr>
<tr>
<td>Age range</td>
<td>12-16 (M = 15.3)</td>
<td>n/a</td>
</tr>
<tr>
<td>Years in 4-H Horse Project</td>
<td></td>
<td></td>
</tr>
<tr>
<td>1 year</td>
<td>0</td>
<td>3</td>
</tr>
<tr>
<td>2-4 years</td>
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<td>2</td>
</tr>
<tr>
<td>Participate in other 4-H projects</td>
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<td>7</td>
</tr>
<tr>
<td>Participate in other horse clubs</td>
<td>9</td>
<td>15</td>
</tr>
</tbody>
</table>

**Data collection**

Participants were recruited with the help of local 4-H agents who were familiar with their 4-H horse leaders and youth. The groups convened on-site in the county connected with their 4-H horse program; two groups were held in 4-H Extension conference rooms and one in a local restaurant meeting room. All participants were given and signed consent forms; the youths’ parents also signed a consent form allowing their child to participate. Participants received a $10 gift card for attending the focus group.

The moderator introduced her background with the 4-H horse program, explained the purpose of the focus group, asked the group to help self-monitor the focus group interaction, and mentioned the presence and reason for video recording during the group. The discussions were recorded through a note-taker and videotaping.

The focus groups followed a general outline of questions posed by the moderator and the discussions followed a semi-structured interview format. This composition allowed participants to interact and engage with one another in a free flowing manner. As in one-on-one interviews, the semi-structured format also allowed interviewees more freedom in what they disclosed and the researcher could highlight certain themes from the free speech of the participants (Corbin & Morse, 2003). Interview questions focused on the benefits of participation, motivation for involvement, the role of competition, parents’ involvement, and the challenges leaders and members face in the 4-H horse program.

**Data analysis**

Because we had a broad set of themes in mind, based on previous observations at 4-H horse fairs and anecdotal evidence that we hypothesized would emerge during the focus groups, the focus group interview outline was developed on these “a-priori” themes. These themes included a heightened level of adolescent passion for and about horses, the importance of competition, and potential sources of conflict in the program. What the horse members and leaders felt about these themes and the nuances related to the themes, however, was unknown. Thus, we sought confirmation of the themes as well as emerging themes from during the focus groups (Barbour, 2007).
Information was observed and analyzed, including the participants’ comments, interactions, body language, and social cues and during careful post hoc evaluation of transcripts, notes, and recordings (Morgan, 1997). After reviewing this information, the emerging themes were documented and sub grouped under headings, a method often used in focus group analysis (Barbour, 2007). We organized the results under the following broad categories:

1) effective and ineffective program factors;
2) leader characteristics, motivations, and challenges;
3) 4-H member characteristics, opportunities, and skills gained; and
4) parent characteristics.

Several themes were found pertinent to at least three of the broad categories such as passion, commitment, conflict, knowledge, life skills, and mentoring. Themes were also noted that were cited frequently within and across groups such as the higher self-esteem, confidence, patience, and leadership skills youth gain from their involvement in 4-H horse.

We also looked for polarities in opinion as well as similarities in the responses. For example, contradictory and ambivalent opinions were expressed about the role of competition. In one case competition was portrayed as a positive motivator for youth to stay involved in the program, as a chance for youth to grow out of competition and focus more on helping others, and in another case as a personal struggle for youth, parents, and leaders. Competition represents a theme that had many connotations connected with it, both positive and negative, and guided us to consider further in-depth research on the role of competition.

Conflict was another theme requiring careful reflection. One group in particular commented on and disagreed about the function of rules, regulations, and professional horse trainers with heightened emotionality. This group also talked about parents undermining leaders and youth. Leaders overstepping their boundaries and conflict between members were also cited. These tensions were not mentioned in other groups with such depth and emotion. Furthermore, when asked directly about conflict the group specifically stated conflict posed a problem for them in the 4-H horse program. The two other groups did not state conflict as a problem and only mentioned minor disagreements. Leaders in these focus groups mentioned being opinionated and disagreeing with parents but never did they mention a problem with members or parents not listening to them. These two groups also mentioned peer mentoring within the program as an important positive experience for their youth. The group claiming conflict discussed peer mentoring with negativity and how youth would not cooperate with other more experienced peers. The members in this group were clearly not benefiting from the youth leadership opportunities as much compared to the other two groups.

The subtle disparities between how differing opinions were expressed and reported between the groups were an important insight into conflict among the 4-H horse programs. This led us to categorize the groups into low and high conflict groups. Further research is clearly needed in the area of conflict and how conflict impacts the effectiveness of the 4-H horse program. While all 4-H horse programs have the potential to help youth with PYD, conflict within a group and among leaders and parents was recognized as a possible negative moderator of success. Alternatively, leaders who are able to work together collaboratively and work effectively with parents provide an environment for youth to thrive and engage with the horse program in such a way that it reaches its full potential in supporting PYD.
Next Steps: Understanding What’s Going on

The results of the focus groups provided us with insight into the processes at work in the 4-H horse program, and set the stage for a large-scale program evaluation that is currently underway. Some processes, such as the building of youth confidence, are consistent with the basic 4-H program logic model. Others, however, raised concern about possible program effects that could negatively influence the predicted program outcomes. These processes were specifically related to conflict among 4-H horse leaders, members and parents. Still other emerging processes were identified, particularly related to the impact of peer teaching on the PYD. Finally, narrative information about the special relationship that teens have with horses, and the potential positive mediating effect on adolescent development invited us to look more closely at the nature of the horse-adolescent bond.

These findings were used to develop an enhanced program logic model that added explicit conditions and actions that may be taking place (see Figure 2).

**Figure 2**

Enhanced Program Logic Model

![Enhanced Program Logic Model](image)

This enhanced model then served as the basis for developing a set of questions to test the accuracy of the program theory:

1. What is the nature of the adolescent-horse bond, and how does this bond contribute to the well-being of adolescents in the 4-H horse project?
2. Does youth participation in the 4-H horse project contribute to the development of life and personal skills of youth? If so, in what ways?

3. What is the extent nature of conflict among 4-H horse leaders? Are there factors that mediate the presence of conflict among horse leaders?

4. Does conflict among 4-H horse leaders have a negative effect on the development of 4-H youth?

Questions one and three are exploratory evaluation questions that will provide insight in the processes through which the 4-H horse program achieves its goal of positive youth development. Questions two and four are predictive evaluation questions that will provide information on possible moderators that may affect the success of the program as outlined in the basic program logic model. Both types of inquiry, exploratory and predictive, are useful for guiding program evaluations, the results of which can be used to enhance basic program logic models as well as to determine program policy and practice in future programming. Enhancing program logic models to understand and examine program theory through evaluation is an important step in ensuring the likelihood of program success in the future.

As stated earlier, logic modeling is a popular and effective form of program planning for many educational organizations. This paper supports the importance of thoughtful logic modeling for developing and evaluating educational programs. At the same time, the results of this work highlight the inadequacies of simple, linear logic models for understanding the complex interactions and moderating relationships present in most educational programs. Such complexities may be even more prevalent in educational programs that rely on the use of trained volunteers to implement programs, which is the case in many youth-serving programs. Developing enhanced logic models that specifically tease out and test potential moderating effects, both positive and negative, could be useful for all youth-serving organizations.

References


Connecting and Communicating Effectively with Teens - An Online Survey of Teen Communication Styles

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Connecting and Communicating Effectively with Teens - An Online Survey of Teen Communication Styles

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Abstract: The lives of most teens are rapidly changing and involve methods of communication that are unfamiliar to many adults. An online teen communication survey was developed to assess how and why teens communicate in order to assist adult educators in developing more effective methods of communication with this audience. The survey was completed by 148 teens ranging in age from 13 to 19. The results of the survey provide insight into teen viewpoints on their preferred methods of communication and provides valuable lessons for adults who work with this age group.

Introduction

Today’s American teens live in a world enveloped by communications technologies; the internet and cell phones have become a central force that fuels the rhythm of daily life (Lehnart, Hilton & Madden, 2005). The lives of most teens are rapidly changing and involves various methods of communication that are unfamiliar to many adults. Technology has become the norm in communication for teens as text messaging, instant messaging and sharing of information on social networking sites rivals inperson communication (Bovitz, 2007).

Research shows that e-mail continues to lose its luster among teens as other methods of communication become more popular for this age group. (Lenhart, Madden, Macgill, & Smith, 2007). To teens, email is increasingly seen as a tool for communicating with “adults,” such as teachers, schools and other institutions, and as a way to convey lengthy and detailed information to large groups. (Lehnart, Hilton and Madden, 2005). Meanwhile, instant messaging is used for everyday conversations with multiple friends that range from casual to more serious and private exchanges (Lehnart, et al., 2005). This finding indicates a potential disconnect
between teens and adults, as teachers and youth educators primarily use e-mail as a method of communication.

Current research shows that approximately 93% of teens use the internet and more of them than ever are treating it as a venue for social interaction – a place where they can share creations, tell stories and interact with others (Lenhart, Madden, Macgill & Smith, 2007). Online social networking is now so deeply embedded in the lifestyles of teens and tweens that it rivals television for their attention (National School Boards Association, 2007).

Adults who work with youth need to be aware of the “hows and whys” of teen communication and be familiar with the many different methods by which they communicate. For teens, social networking, text messaging and instant messaging are the norm. A “connected” adult can work more effectively with teens and help them make proper online decisions as well as help them become better offline communicators.

**Study Rationale**

Beginning in late 2006, 4-H educators in New Jersey indicated increasing difficulty in maintaining consistent communication with teens in their programs. E-mail was becoming less effective as a tool for communication as increasing numbers of teens indicated that they did not regularly check their e-mail. This communication disconnect led to information on events and teen opportunities being missed and some frustration on the part of the adults. Educators also noticed a great increase in the number of teens who had cell phones and a much greater reliance on text messaging. Some educators indicated that teens disrupted meetings and events due to constant text messaging with other teens, including others who were in the room with them. A new language was also being developed and used by teens for this type of communication, and was carrying over into the work they did on written applications and record keeping in the 4-H program.

Most adult educators did not understand the reasons behind this strong shift in communication styles. As a result, an online teen communication survey was developed to not only assess how teens involved in the program were communicating, but why. The purpose was to assist 4-H youth educators with developing more effective methods of communication with teens in the 4-H program and to provide information for parents of these teens.

**Survey Design and Distribution**

The survey was designed with the assistance of 4-H teens who helped to develop questions that would appeal to high school aged teens. The survey aimed to assess teens’ preferred methods of communication (in person, phone, text messaging, instant messaging and social networking), their perceptions on how effectively teens communicate both in person and online, and their feelings on social networking sites. Survey Monkey was used as the vehicle to distribute the study.

The link to the survey was first shared with 4-H educators in New Jersey. They distributed the survey by sharing the link with teens at 4-H meetings or via e-mail. Some 4-H teens also assisted with distribution of the link to the survey by sharing information with their friends through social networking sites. The survey was then shared with 4-H professionals in other
states through seminars presented on teen communication at the National Association of Extension 4-H Agents and the Children, Youth and Families at Risk Conferences 2007 and 2008.

The survey results collected were confidential and did not provide a link to e-mail addresses or personal information. The survey only asked questions on the age and state of residence and any of the questions could be skipped if the respondent was uncomfortable with the content of the question.

**Results**

The survey was completed by 148 teens, 111 from various counties in New Jersey, 8 from Kansas and 29 from Kentucky. Youth taking the survey ranged in ages from 13 through 19. Almost 30% of teens responding did not indicate their exact age. Although the survey was confidential, the lack of response to this question could be due to the fact that many teens did not want to connect their age with whether or not they were utilizing social networking sites.

**Communication Methods**

 Teens indicated that they utilize a variety of methods for communication. This is supported by current research which labels these youth as “multi-channel” teens (Lenhart, Madden, Macgill, & Smith, 2007). These teens can talk to friends via text messaging, instant messaging and posting comments on social networking sites all at the same time.

### Table 1

Teen Reported Methods of Communication. N=148

<table>
<thead>
<tr>
<th>Utilize this Method</th>
<th>Is the Primary Method for Communication *</th>
</tr>
</thead>
<tbody>
<tr>
<td>Talking on the Phone</td>
<td>95.9% (142)</td>
</tr>
<tr>
<td>Text Messaging</td>
<td>74.3% (110)</td>
</tr>
<tr>
<td>Instant Messaging</td>
<td>64.9% (96)</td>
</tr>
<tr>
<td>E-mail</td>
<td>78.4% (116)</td>
</tr>
<tr>
<td>My Space</td>
<td>45.9% (68)</td>
</tr>
<tr>
<td>Facebook</td>
<td>33.8% (50)</td>
</tr>
</tbody>
</table>

* two respondents skipped this question

**Online vs. In Person Communication**

When asked about online communication, the majority of teens (45.9%) indicated that they spend between one and three hours communicating with others each day, while 37.8% spent an hour or less, and 14.2% spent between three and five hours online.

Almost two-thirds (60.8%) indicated that they feel more comfortable communicating in person, while approximately one-third (39.2%) reported that they were more comfortable communicating online or by text messaging. When asked why, responses were varied, but followed two themes: in-person communication is more sincere, and online/text messaging can help some teens feel more confident initiating conversation or approaching an uncomfortable subject.
“It’s hard to understand exactly what a person means through texting ... when you are face to face you can see their expressions and know exactly what they mean.”

“People online aren’t always who they say they are.”

“(Online/texting) gives me more time to think out what I want to say and if I’m scared to ask someone I might feel more comfortable asking them through those means.”

Survey respondents were also asked whether they feel teens are able to communicate effectively in person. This question was included to determine whether teens felt that the popularity of text messaging and online communication had any affect on teens’ in-person communication skills. Almost 70% felt teens were effective in-person communicators, while 30% said they were not, with comments as follows:

• “Teens are people. Everybody has times when they can’t communicate, but it depends on the person, not the age.”

• “Although teens rely on the internet for nearly everything, friendships can’t survive without seeing someone, this forces people to be able to communicate without a computer.”

• “I feel that the art of talking to someone face to face has decreased, but it is not a total loss.”

• “People aren’t used to talking in person, how to respond to things on their toes, without having a computer to hide behind.”

When asked if online communication or text messaging has ever caused a problem for teens, only 35% said yes. These teens indicated that the primary reason for problems resulted from a lack of understanding or lack of interpretation of the true meaning of an online or text message. Teens indicated that “sometimes words can be misconstrued because you can’t say them the way you mean them when they are typed.”

**Social Networking Sites**

Over two-thirds of teens responding did participate in social networking on popular sites such as MySpace and Facebook, which follows trends shown by current research.

**Table 2**

<table>
<thead>
<tr>
<th>Question</th>
<th>Yes</th>
<th>No</th>
<th>No answer</th>
</tr>
</thead>
<tbody>
<tr>
<td>Do you have a MySpace or Facebook page?</td>
<td>69.4% (102)</td>
<td>30.6% (45)</td>
<td>1</td>
</tr>
<tr>
<td>If you have a MySpace or Facebook page, are your parents aware of it?</td>
<td>80.5% (95)</td>
<td>19.5% (23)</td>
<td>30</td>
</tr>
<tr>
<td>Do you care if your parents know what is on your page on these sites?</td>
<td>16.3% (20)</td>
<td>83.7% (103)</td>
<td>25</td>
</tr>
</tbody>
</table>

Most teens who answered “no” to the first question did not answer the second and third questions. When teens were asked for their opinions on these social networking sites and
whether they would want their parents to view what they posted, the comments were varied such as:

- “It’s not that I put anything bad on it, but them checking up is a sign of distrust.”
- “You act differently around different groups and people. My online pages are who I am around my friends. I’m not going to create a page based on the personality I have around my parents, but the personality I have around everyone else.”
- “In my eyes if they are good parents they should care if you have one with all the random scary people that can be on the internet.
- “I want them to know what is on there. I want them to trust me and I don’t want them to think I am hiding anything from them.”

**Conclusions and Implications for Youth Development Professional**

The study provides many implications for adult educators working with teens. Adults need to understand that online communication, text messaging and social networking are the norm for teens and that these types of communication are “here to stay.” The technologies may change but the need to communicate online and instantaneously will not. The following are suggestions for adults who work with teens:

- Be familiar with the methods teens use to communicate with their friends. Adults do not need to develop their own MySpace or Facebook page, but should be well aware of the positive and negative aspects of these sites.
- Develop expectations for teens at meetings and events. In many instances, talking during meetings is now replaced with text messaging during meetings. Be sure that the same behavior standards are being used regardless of the method of communication.
- Make teens aware of the consequences of sharing too much information or posting inappropriate comments or photos in a public domain. Teens may indicate that they never communicate with people they don’t know online, but some will post their complete address and cell phone number, without understanding the implications of sharing all of this personal information. Teens may also provide through their “online status” a description of where they are such as, “at the mall from 6-9 then at Julie’s house.” These online safety issues can be addressed by adults or older teens through group or individual discussions. Teens also need to be made aware that they can be judged by information posted by their friends. A potential employer or college can make assumptions on a teen’s values based not only on what they post but the comments and pictures posted by their online “friends.”
- Find ways to safely harness the educational value of social networking. Blogs, monitored chat rooms and safe networking sites can be used by teen groups to communicate and share information.
- For adults that do participate in online social networking sites, be sure to use these sites wisely when working with teens. Make sure your information, pictures and postings are all appropriate for viewing by the teens you work with. If they are not, maintain separate sites for your friends and for the teens in your program. Be sure not to accept teens as “friends” if they have inappropriate material on their site. Being connected to teens through these sites can be useful for maintaining communication, but needs to be used sensibly.
• Provide workshops for teens to help them maintain their verbal communication skills. Offering interviewing skills and resume writing workshops can assist teens in developing and enhancing skills needed for school projects and college and job interviews.

• Provide informational materials and/or workshops for parents, so they can be well informed on how and why teens communicate as they do.

References


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Local Food: Does It Matter What You Eat?

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Local Food: Does It Matter What You Eat?

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Abstract: Everybody eats. Period. Some of us prefer hamburgers. Some like veggies. But what we eat is only the beginning. Increasingly, interest in where our foods are grown and processed has emerged. As numerous grass roots organizations proffer information on local foods, it becomes critical for research-based youth programs to also encourage study on this topic. This article introduces a new curriculum that aims to help students learn about what we eat, where it comes from, and how it impacts the environment. The main goal is to help participants understand the concept of local food systems, how they operate, and how students and their families can be involved in creating positive changes. It targets students in grade school thru high school. By stimulating their interest at an early age, we can encourage their participation in the local food systems movement. The curriculum is available as a self-study guide at no cost. Email: raison.1@osu.edu.

Introduction

Everybody eats. Period. Some of us prefer hamburgers. Some like veggies. Almost all like to choose items from the “Cake Food Group.” (Okay. That’s not really in the food pyramid.) But what we eat is only the beginning. Increasingly, the interest in where our foods are grown and processed has emerged. As numerous grass roots organizations proffer information on local foods, it becomes critical for research-based youth programs to encourage study on this topic.

The goal of this new curriculum is to help students learn about what we eat, where it comes from, and how it impacts the environment. Participants will learn about the concept of local food systems, how they operate, and how students and their families can be involved in creating positive changes. The saying says, “You are what you eat.” And if that’s true, this program will challenge students to begin thinking about eating in a manner that positively affects their family, school, community, country, and world.
The curriculum is set up as a program guide that introduces activities to engage students in a wide age range from grade school thru high school. Again, with the dramatic increase in the interest and activity of local foods programming, it becomes critical to engage a student audience. Stimulating their interest at an early age will encourage their participation in the future.

**The Approach**

The program guide begins by asking students to think more critically about food: Does it matter *where* your food comes from? Is there any difference between tomatoes grown locally vs. those that arrive on a truck from 1,500 miles away? What does *chemical ripening* of fruits and vegetables mean? Is that safe? Can what you eat really impact the environment . . . positively or negatively?

**Why Local Food?**

The curriculum introduces students to the dramatic increase in the amount of news reports on local foods. It discusses how more and more people are planting gardens or making a point to buy their food from a farmer in their local community. Locally grown food is healthier, fresher, cleaner, and better tasting... and it keeps the money in the local economy (Fisher, 2006; Thomson, 2006; Timmons, Wang and Lass, 2008; UMD 2010).

Here is an excerpt of the “Why Local Foods” segment. It provides an idea of the approach and tone of the curriculum.

*Let’s begin with the news reports. Along with the local foods interests, other stories detail all kinds of food recalls. It seems that every month you hear about another batch of contaminated food along with warnings about eating it. Killer peanut butter. Killer spinach. Killer dog food. What’s next? Is some contaminated item already in your freezer? Help!*

*Clearly, the big question for students is this: Can we do anything to ensure a safe and nutritious food supply? The short answer is yes. Let’s begin with a discussion of the concepts of basic supply and demand economics and how they might influence the local foods markets.*

Reasons to buy locally grown and produced foods are also discussed. For example, the Rural Life Center at Kenyon College in Gambier, Ohio produced a brief fact sheet providing some key points.

1. **Freshness.** Local fruits and vegetables are usually harvested and sold more quickly so they do not contain the preservatives that are added to products shipped long distances and placed in storage.

2. **Taste.** Produce that is ripened on the vine has better texture and flavor than produce harvested unripe, then treated with chemicals and ripened during shipping.

3. **Nutrition.** Nutritional value declines—often drastically—as time passes after harvesting.
4. **Improving the local economy.** When you buy homegrown food, you circulate your food dollars inside the local area.

5. **Strengthening producer/consumer relations.** When purchasing food locally, consumers can ask how the product was grown and processed, what chemicals if any were used, and any other questions they may have. People tend to trust individuals they know.

   **Economic and environmental considerations**

   Students will be introduced to the basic concepts of *food miles*. On average, most food travels over 1,500 miles before it reaches our plates (Hill, 2008; Pirog, 2003). That distance obviously has a negative impact on the environment. Transportation vehicles (trucks, trains, airplanes) burn fossil fuels that pollute the environment. But students must also consider *economies of scale* that exist in the trucking and shipping industry. We give an example of one large truck that carries 50,000 pounds of tomatoes may cause less pollution than 50 smaller trucks carrying 1,000 pounds each. Finally, we ask if students would rather help create and maintain food-related jobs in their local community or send dollars out of state?

   **Food systems and policies**

   The curriculum briefly introduces *local food systems*: the often complex network of food producers (farmers), food consumers (eaters), and the businesses that link them together. Some refer to this as the food chain. Generally speaking, there are five main links in the food system chain:

   1. Production  
   2. Distribution  
   3. Processing  
   4. Consumption  
   5. Waste recovery

   But a local food system does more than just connect growers, businesses, and consumers in a region. It considers the bigger issues of health and nutrition, economic development, environmental sustainability, and overall community strength. Together, these elements greatly impact how people in a community live and interact. Increasingly, these elements are governed by food policies.

   A food policy consists of the rules and regulations that govern how food is produced and distributed. These are generally run by a Food Policy Council whose primary goal is to cultivate a stronger and more sustainable local food system in order to bring benefits to residents of a region.

   **Activities and things to do:**

   Here are samples of the activities that students may do to complete the project curriculum. These vary in complexity and may be given as optional assignments, depending on their age category.

   **Food at Your House: What’s in your refrigerator?**

   - Meal Planning: incorporate at least 2 locally grown or produced foods into your family meals each week for one month. (Next month, try for three or four!)
   - Family Food Survey: Review your family’s food shopping habits.
1. Make a list of the stores where your family usually buys their food.
2. Are the stores owned locally or are they regional/national chains?
3. Why does your family choose to shop there?
4. Does your family ever shop at farmer’s markets?
5. If not, what would make them stop and shop there?
6. Are you concerned with food safety? List 4 things that might cause concerns.
7. Are you aware of the food eco-footprint? List 4 ways that food production and distribution might negatively impact the environment.

   o Start a compost bin in your kitchen. Keep it clean and fresh by emptying it every few days into a compost pile outside.

**Food at Your School: What are they serving?**

   o Ask your school cafeteria director if they serve any local foods. Dig deep. Ask why or why not?

   o Do a quick Internet search on “local food in schools” and write a short essay (2 or 3 paragraphs) describing your findings. Could your school participate? What foods would be easy to begin with?

   o Organize a campaign to ask your school to offer fruit that is grown locally. Include vending machines!

**Food in Your Community: Where can you buy local foods?**

   o Ask your supermarket produce manager if they purchase foods that are grown or produced locally. Dig deep. Ask for their definition of “local.” Do they consider it within a 50-mile radius?

   o Investigate restaurants in your town that serve locally grown or produced foods. The next time your family eats out, ask to go to one of them. (And remember to tell the restaurant why you chose them!)

   o Investigate farmers markets in your area. How many are there? What days / hours do they operate? What types of foods and products do they sell?

   o CSA Sign-Up: Go online and search for any Community Supported Agriculture (CSA) or Food Co-Op operating in your area. Investigate the pricing structure. Compare it to supermarket expenses. Discuss with your family the benefits of fresh food, and think about signing up.

   o Do a report for your class or club on what you’ve discovered under this “Food in Your Community” topic.
Food in Your World: *Where does it come from? Is there a balance between local and far?*

- Conduct a food-origins survey: Go to any grocery store, look at the fruit, and make a list of all the *countries* (non-U.S.) the fruit comes from. Which is furthest away? Which is closest? What one surprised you most? Is there one you’ve never heard of?

- Do a quick Internet search on “fair trade” foods. Is this labeling system helpful to people in other countries? Do you think it helps the environment? Write a short essay (2 or 3 paragraphs) on why or why not.

- Write a short essay (2 or 3 paragraphs) on why it’s okay to purchase and eat foods that are from far away. Think about health benefits (e.g., eating citrus that is rich with Vitamin C during cold and flu season). Does health outweigh the transportation issue?

**Conducting the program**

The Local Foods Idea Starter curriculum was blind peer reviewed at Ohio State and then shared with colleagues at the National Association of Community Development Extension Professionals (NACDEP) national meeting in Minneapolis in April, 2010. Educators at the West Virginia State University Extension service are already planning to incorporate the curriculum into their Jr. Master Gardener outreach and teach it with their 4-H programming. Feedback is still limited, but initial reports from students have been quite positive.

Youth development educators may contact Brian Raison [raison.1@osu.edu] for a free electronic copy of the curriculum. It is designed to be used with a self-determined project outline such as the OSU Self-Determined 4-H Project Starter Guide (also available as a free download).

**References**


