


Fostering Gender Equity among Early Adolescents: Benefits of adding family and community interventions to the Choices curriculum

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LIST OF ACRONYMS

CEDPRA	Center for Development and Population Activities
DCWB	District Child Welfare Board
DDC	District Development Committee
DEO	District Education Office
FGD	Focus Group Discussion
IRH	Institute for Reproductive Health
IVR	Interactive Voice Response
NGO	Non-Governmental Organization
SSDO	Sunshine Social Development Organization
VDC	Village Development Committee
VYA	Very Young Adolescent

EXECUTIVE SUMMARY

In Nepal, women and girls face discrimination on multiple levels by virtue of their sex, caste, and ethnicity. Many women and girls are unable to fully participate in school, family life, and economic activities because of discrimination and violence. Recognizing that early adolescence represents a unique window of opportunity to address these challenges, over the period of 2009 to 2015, Save the Children developed and tested a package of gender transformative interventions for children, their parents and community.

In 2015, for the first time, all three components of the Very Young Adolescents Gender Norms Package were implemented together to determine whether there are additional benefits of working not only at the individual, but also the family and community levels of the ecological system.

Study design and methods. We conducted research to determine the benefit of layering on parent and community level interventions to the VYA-focused Choices program in the Kapilvastu District in the Terai Region of Nepal. Four Village Development were selected for this study representing 36 child clubs. The VDCs Dhanakauli and Jahadi were assigned to the experimental group, while Mahuwa and Niglihawa were assigned to the control group. In both the control and study arms VYAs participated in Choices. In the experimental arm only, the parents of Choices participants were invited to

participate in Voices, and the community received the Promises intervention. Baseline data collection took place in April 2015, approximately one month before the intervention began. End line data collection took place in April 2016 three months after intervention activities ended. A total of 900 participants in each arm (300 girls, 300 boys, and 300 parents) completed structured interviews at baseline and end line. Qualitative data was also collected to provide insights into participation in Choices, Voices, and Promises and to explore the effect of rolling out the three components simultaneously. A total of five focus group discussions, each with six to eight participants, were conducted with parents in control and experimental areas. In addition, in-depth interviews were held with 15 girls in the control group VDCs and 14 with girls in the experimental VDCs. Photo elicitation and vignettes were used to keep parents engaged and avoid direct questions to reduce courtesy bias. The in-depth interviews with girls centered on use of a family of small dolls, Amita (sister), Bibek (brother) and their parents, and grandparents. During the interview, the girls were given the dolls and encouraged to act out situations set out by the interviewer.

VYA Gender Norm Package

Choices: Challenge **boys' and girls'** views on restrictive gender norms and promote gender equality through a facilitated set of interactive activities.

Voices: Increase dialogue between **parents** and VYAs that diminishes inter-generational transfer of inequitable gender norms and improves equality in the household (i.e. increases the age of marriage for girls, girls' educational attainment, equitable distribution of household chores by boys and girls, etc.) through facilitated group dialogue following trigger videos.

Promises: Shift norms within the **community** to create an environment where education for girls is valued more highly than early marriage through a series of posters placed in the community and social diffusion by community influencers engaged in a facilitated dialogue.

Learn more [here](#).

Measures and analysis. The need for high quality measures specifically validated with early adolescents is widely recognized (Blum et al., 2014). The study team developed and tested parent and VYA measures of gender norms, attitudes, and behaviors in five domains: gender equitable education, household chores, delayed marriage, gender equity in aspirations, and supportive and loving relationships. After rigorous quality assessment, including analysis of internal consistency, dimensionality, and construct validity, few of the potential scales resulted in moderate or high quality measures. While several groups of items had poor internal consistency and showed little promise for further development, a number of scales had good internal consistency but lacked sufficient range. Some of these domains may benefit from further testing with additional items or with additional response options. Many of the single item measures tested also had limited range, with more than 80% of participants endorsing the more gender-equitable response.

The scope of moderate and high quality measures for VYAs spanned four domains of gender socialization. While most of these measures consisted of single items, the card sort gender role scale measuring attitudes about gender equity in aspirations was particularly promising, corroborating prior findings from the Choices evaluation that validated the instrument in a similar population (Lundgren et al., 2013). In comparison to other attempted scales in our survey that used more traditional question modalities, the card sort format may have worked better for this young age group. This scale has promise for use in other VYA populations, and researchers may consider adapting other scales to the card sort format for use with VYAs. Quality single item measures in the four domains spanned norms, attitudes, and behaviors. We identified four such measures around household chores and free time, three measures about gender equitable education, and one measure each about delaying marriage and gender equitable aspirations.

For parents of VYAs we identified only two single item measures of moderate quality, both within the domain of delaying marriage for girls. The utility of these measures, particularly the attitudinal measure, will depend on the extent to which early marriage is accepted in a given context, as universal endorsement will result in poor discrimination.

Baseline and end line moderate and high quality measures were used to evaluate the effect of adding the parent (Voices) and community (Promises) components to the VYA gender transformative Choices intervention. We used logistic regression models for dichotomous outcomes and linear regression models for continuous outcomes.

Intervention Implementation. Save the Children's partner community based organization Sunshine Social Development Organization (SSDO) was responsible for implementing and monitoring the Very Young Adolescent Gender Norms Package. Save the Children trained NGO staff on concepts related to gender, power, and inequality during a three-day long interactive training. This essential first step allowed staff to reflect on their own values, biases, and norms to enable them to implement the intervention without biases. Following the initial gender training, 72 Choices facilitators (36 girls and 36 boys) were selected from the child clubs. A total of two facilitators, one girl and one boy, were chosen from each. Selection took place during child club meetings; members recommended facilitators who

were between the ages of 16 and 18, literate, demonstrated leadership and had the potential to be a dynamic facilitator. Subsequently, the partner NGO conducted a five day training for Choices facilitators to develop facilitation skills and understand the content and process of the nine Choices sessions. Save the Children also trained the NGO community mobilizers, project officers and program coordinator to implement Voices. Lastly, Save the Children conducted a two day training for four NGO community mobilizers on Promises implementation.

Choices sessions were conducted every Saturday for two hours over a three month period. Choices was developed to be conducted every two-to-four weeks to allow time for the participants to process and internalize new information and test new behaviors, however a compressed schedule was used due to the many external factors impacting the study's timeline, including the 2015 earthquake and 2016 political strikes, curfews, and fuel shortages. According to the participant registers, between half and 70% of the child club participants attended five or more of the nine Choices sessions. The mean attendance across all VDCs was about five out of the nine sessions. Participation was much higher in the control VDCs, where there were no parent or community activities, than in the experimental VDCs.

Voices was implemented in each of the 18 wards in the two experimental VDCs. Voices consists of six videos each lasting about ten minutes. The original design of Voices was to hold three video screenings, with two videos shown and discussed during each session. Because of the challenges mentioned above, Voices was rolled out with only two video screenings per ward with participants watching and discussing three videos during each session. All of these screening sessions were conducted during the same three month period during which Choices was being conducted with their children.

Two weeks after Choices began, the first of six Promises posters was installed on the strategically placed community message boards. Extension workers invited pre-selected influential community members to the poster unveiling and conducted a group dialogue. For the next eight weeks, the subsequent poster was installed accompanied by a group discussion approximately every ten days. Community influencers were encouraged to talk about the posters with their friends and family and motivate them to go look at the poster. After the presentation of all six posters in each ward, which coincided with the end of the Choices and Voices sessions, a community celebration was organized at the VDC level.

Participation in the intervention. All of the children interviewed participated in Choices, although the frequency of their participation varied. With regards to the parents in the intervention arm, seven out of ten (69.9%) reported watching the videos during a community meeting, six out of ten (59.5%) noticed posters on girls education and nearly three out of ten (29%) attended a community celebration. Even in its abbreviated format, the package reached about 70% of parents and 60% of fathers. No parents in the control arm reported seeing the videos or posters.

Intervention Effects. Evaluation of the effect of the parent/community interventions on parent-reported gender measures was limited because there were few measures of sufficient quality. The two parent measures that were of moderate quality, both in the

domain of delaying marriage for girls, did not exhibit a positive effect of the addition of Choices/Promises to the Choices intervention. We saw more promising results in our assessment of the intervention effect on VYA reports of gender measures. In fact, the majority of the moderate/high quality VYA measures had a positive intervention effect, in that the improvement in the measure from baseline to end line was greater in the intervention areas than in the control areas. These positive intervention effects were concentrated among measures in the gender equitable education and gender equitable household chores and resource sharing domains. There was less evidence of intervention effect in the domains for delaying marriage for girls and gender equity in aspirations. Baseline end line comparisons for the entire sample (assessing the effect of Choices) found positive effects on gender equitable norms, attitudes, and behavior. However, lack of a counterfactual group that did not receive Choices limits the interpretation of these results, as gender equitability may have increased for other reasons.

There are many possible reasons why the additional parent and community interventions did not have as strong an effect as intended, including the possibility that they were not efficacious. However, the results of earlier evaluations of these interventions, combined with the qualitative findings which suggested that VYAs and parents found the parent and community interventions transformative, lead us to consider other possibilities, namely whether the intervention was strong enough as implemented and whether effects were adequately measured. The gender norms package was not implemented with fidelity to the model. In order to roll out intervention activities in a context of delay and civil unrest, Save the Children staff in Kapilvastu made the decision to compress the intervention from eight to three months. Reduced time for reflection and trialing behavior could have slowed down behavior change. In addition, VYA participation in Choices was higher and more consistent in control areas, as compared to intervention areas. Parent participation in the first Voices video session was low, although it picked up substantially for the second meeting. Taking these factors into account, it is remarkable that almost 70% of parents reported attending at least one session and that significant intervention effects were observed.

Gender measures by participant characteristics. Finally, we looked at variation by participant characteristics. We found that parent measures did not vary greatly by gender, age, and religion. Our analysis of parent data, however, is limited because only two measures were of moderate or high quality. VYA measures, on the other hand, varied by gender but largely were similar across age groups. Each of the moderate or high quality measures differed significantly by gender, but not in a consistent direction. This variation underscores the theory that girls and boys experience different gender socialization processes, and may be socialized differently in various gender and behavioral domains (Kagesten et al., 2016). Interestingly, we did not observe substantial variation in gender measures between younger VYAs (10-12) and older VYAs (13-15), despite the widely recognized assumption that gender socialization intensifies over the course of early adolescence (Hill and Lynch 1983).

Conclusion. The importance of the early adolescent life stage in gender socialization is increasingly recognized, yet this population has not yet been thoroughly studied. VYA

program efforts are in the early stage, with little rigorous evidence on what works, for whom, and under what circumstances. This study addresses this gap by presenting quality assessment of gender-related measures of norms, attitudes, and behaviors for VYAs and their parents. Furthermore, our results suggest that including a parent component to a VYA gender transformative intervention may increase VYA's reports of gender equity in education and household domains. This work provides a foundation for future gender research and intervention with this population, and identifies foundations for further development of additional measures. Based on the promising, though inconclusive results of this study, we suggest that researchers and practitioners continue to address the central question explored here, the value of working beyond the individual level of the ecological system. Carefully tailoring the intervention to address the normative factors related to girls education and early marriage in the specific setting, implementing the combined gender norms package as designed, and improving the evaluation by using the successful measures developed during this study, and complementing them with other measures, are important next steps in VYA programming.

1. INTRODUCTION

1.1. Background

In Nepal, women and girls face discrimination on multiple levels by virtue of their sex, caste, and ethnicity. Many women and girls are unable to fully participate in school, family life, and economic activities because of discrimination and they may be exposed to various forms of psychological and physical violence. Adolescence is frequently viewed as a window of opportunity to address these challenges by formulating positive attitudes and behaviors. An ecological, life course perspective suggests that developing adolescents are strongly influenced by family, community, and macro level factors (Blum, 2014). Therefore, interventions that work across individual, relationship, community, and societal levels are likely to have the greatest success in shaping adolescent health outcomes (Svanemyr, 2015).

In order to improve gender equity among very young adolescents (VYAs) 10-14 years old, Save the Children developed an innovative gender transformative package with three distinct interventions addressing different ecological levels. Evidence of the need to intervene at multiple levels of society in order to make a lasting impact on gender equity propelled Save the Children to develop a package that intervenes not just with adolescent girls and boys themselves, but with different actors in their communities who set norms and influence behaviors. The Choices curriculum was developed and piloted in Nepal in December 2009 and evaluated in 2010. The pilot results showed statistically significant improvements in gender attitudes and behaviors (Lundgren et al., 2013). In 2011 Promises was developed to help shift community norms related to school attendance and early marriage of adolescent girls. Results of a mixed-method process evaluation suggested that the use of community posters and influential community members successfully diffused messages through the community. This resulted in fathers recognizing the positive contribution of their daughters to the community and the need for them to mature prior to marriage. Realizing that parents were not specifically targeted through Choices and Promises, the third component of the gender norms package, Voices, was developed in 2014. The Voices intervention challenged existing beliefs and attitudes held by parents on traditional and restrictive gender roles and their gendered expectations of their children, while fostering inter-generational dialogue between parents and children about gender equity in the household. In 2015, for the first time, all three components of the Very Young

Figure 1. Save the Children's Very Young Adolescents Gender Norms Package

Choices: Challenge **boys' and girls'** views on restrictive gender norms and promote gender equality through a facilitated set of interactive activities.

Voices: Increase dialogue between **parents** and VYAs that diminishes inter-generational transfer of inequitable gender norms and improves equality in the household (i.e. increases the age of marriage for girls, girls' educational attainment, equitable distribution of household chores by boys and girls, etc.) through facilitated group dialogue following trigger videos.

Promises: Shift norms within the **community** to create an environment where education for girls is valued more highly than early marriage through a series of posters placed in the community and social diffusion by community influencers engaged in a facilitated dialogue.

Learn more [here](#).

Adolescents Gender Norms Package, Choices, Voices, and Promises, were implemented at the same time within a community.

This report provides the results of a study conducted in Kapilvastu, Nepal testing whether implementation of these three interventions targeting VYAs as well as their parents and broader community yields synergistic effects on the expectations, restrictions, and opportunities for boys and girls.

1.2. Problem Definition

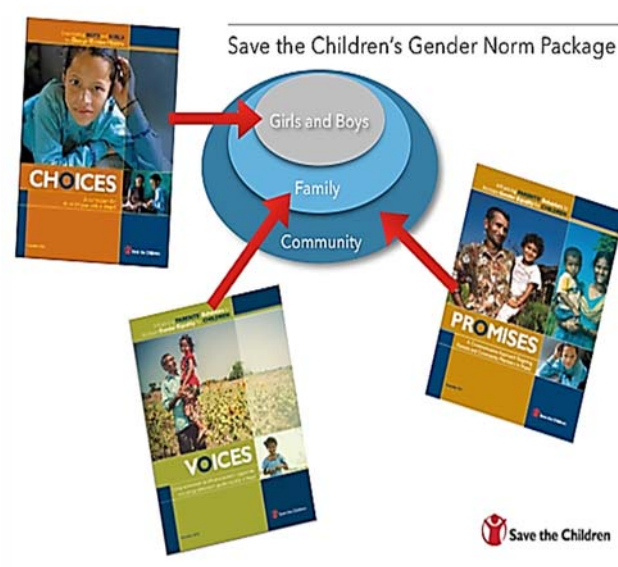
Gender inequity in Nepal is a serious, complex issue, with detrimental impacts on the social, economic, and political lives of women and men alike. Creating more gender equitable social norms could have important and positive impacts for Nepalese communities. The purpose of this study was to evaluate a multi-level intervention (involving girls; male siblings and peers; parents; and community members) to determine if there are additional benefits with regards to gender equity, when working at the individual, family, and community levels of the ecological system.

Our hypothesis is that there will be greater changes in gender norms and better life opportunities for girls when interventions at all three levels are conducted together in a community. Few studies have tested application of the ecological model to positively influence gender and social norms and behavior change among girls.

1.3. Rationale and Literature Review

The future of Nepal rests on the life trajectories of the current cohort of 6.6 million boys and girls between the ages of ten and nineteen. They represent 23% of the country's population, and about 80% live in rural areas (Ministry of Health and Population Nepal, 2006). Early marriage and childbearing constrain the ability of many Nepali girls and boys to establish healthy, economically productive families. Although the legal age of marriage in Nepal is 20 years, 15.5% of women aged 20-29 were married by the age of 15 (WHO, 2017). Childbearing also begins early, almost a quarter of women in Nepal give birth before they reach the age of 18 (Ministry of Health and Population Nepal, 2006). To address these challenges, the Nepali government launched a national program in 2010 to promote adolescent health as part of its five-year health sector plan, linked to comprehensive school-based sexuality education to address early marriage and girls'

Figure 2. Save the Children's VYA Gender Norms Package



empowerment. In this context, Save the Children is testing and scaling initiatives to empower girls and young women with the skills and information they need for a bright future, fostering gender equitable boys and men, and establishing families and communities which support gender equitable opportunities for all society members.

The study site for this research was Kapilvastu, a rural district located on the Terai, the flat lowlands of the Western Development Region some 163 miles southwest of Kathmandu, Nepal's capital. The climate is hot and humid most of the year, and the majority of residents rely on agriculture to make a living. The district covers an area of 1,738 km² and has a population of 481,976. The district has large percentages of disadvantaged populations including Kurmi (31%), Muslim (19%), and Tharu (13%). It is a multi-lingual society with 21 different languages spoken in the district. Gender disparities are evident in the Terai, as elsewhere in Nepal. For instance, the overall literacy rate of men six years and above is 46%, with only 30% for women. The adult literacy rate is only 29%, significantly lower than the national average of 37% (Save the Children, 2011).

Women and girls in the Terai and throughout Nepal face discrimination on multiple levels by virtue of their sex, caste, and ethnicity. Throughout their lives, women do not have equal opportunities in educational and economic activities (Asian Development Bank, 1999). The unequal value attributed to men and women can be seen in the denial of education, health, mobility, property, and other rights and exposure to various forms of psychological and physical violence. Evidence exists of a persistent gender gap in education, which constrains the lives of female children and women (UNICEF, 2001). Data also suggest that girls in Nepal grow up to be malnourished and physically smaller than their male counterparts. Often, their illnesses go undetected or untreated (Sohoni, 1994). A reflection of the degree of female deprivation is the fact that Nepal is one of the few countries in the world in which males live longer than females (Asian Development Bank, 1999).

Many of the challenges faced by adolescent girls in Nepal are related to gender norms – rules of behavior shared by family and community members. These are held in place by positive and negative sanctions and embedded in a complex web of attitudes, values, and beliefs about the way that males and females should behave. These norms influence the decisions families make regarding their children's lives, including discipline, recreation, health care, education, and marriage. Gender norms underlie the restrictions girls face on their freedom and their socialization to be modest and quiet (Singh, 1990). As mentioned above, adolescent girls in Nepal face significant social barriers to accessing education and health services, many of which are related to normative beliefs about male and female identities. The education gap is due in part to the fact that girls face social and community pressure for early marriage. The social institutions of early marriage, *dahej*, and other restrictive practices exist and sustain patriarchal society and the caste system in the Terai. In the realm of health, women generally have less agency than men when making health care decisions (Acharya et al., 2010).

Expectations of appropriate roles and behaviors for women (and girls) and men (and boys), as well as the social reproduction of these norms in institutions and cultural practices – are directly related to health-related behaviors (McCleary-Sills et al., 2012;

Greene and Barker, 2011; Marcus and Harper, 2014). Indeed, the Sustainability Development Goals build on numerous meetings and commitments reflecting the consensus that gender inequality undermines health and development, and that questioning rigid gender norms and promoting gender equality can improve health outcomes (Yamin et al., 2013). This is especially true in Nepal. Acharya et al. (2010) notes that “In Nepal, lack of women’s power in the household decision-making process may have contributed to insufficient health care-seeking behavior” (p. 10). A comparative study in Nepal by Morgan and Niruala shows that women with greater levels of autonomy are more likely to use contraception (1995). Data from Nepal also show that women who discuss family planning with their partners have greater likelihoods of receiving skilled pre-natal care, and care at delivery (Furuta and Salway, 2006).

Although the global priority is investing in girls, the ways that men and boys influence their peers, partners, children, and families must not be overlooked. It is increasingly acknowledged that hegemonic masculinities developed and enforced during puberty have significant negative effects on girls (as well as boys) (Greene and Levack, 2010). Inequitable gender norms manifested by men influence a wide range of issues, including HIV and STI prevention, intimate partner violence, parenting, and health-seeking behavior (Marsiglio, 1988; Courtenay, 2000; Pleck, 1993). A global systematic review of factors shaping young people’s sexual behavior confirmed that gender stereotypes and differential expectations about appropriate sexual behavior for boys compared with girls were key factors influencing their sexual behavior (Marston and King, 2006). International agreements such as the Programme of Action of the 1994 of the International Conference on Population and Development affirm the need to engage men and boys in questioning gender norms, and a number of programs are doing so with some success (Barker and Ricardo, 2005).

A challenge to these gender inequitable and harmful social practices is also a challenge to patriarchal power, thus considerable commitment and perseverance at all levels is required to promote greater gender equity through education, employment, health care, and the legal system. Working with very young adolescents is a critical part of this effort, as is starting early before gender roles and attitudes are firmly entrenched. The results of a recent review found that early adolescence is marked by increasing expectations that boys and girls adhere to socially constructed norms that perpetuate gender inequalities and are closely linked to poor health-related outcomes (Kagesten et al., 2016). The authors of the review advocate investment in early adolescent programs to avoid the need to tackle the difficult task of changing behavior later in life. Indeed, this phase of the life course is widely viewed as a window of opportunity to formulate positive attitudes and behaviors (Igras et al., 2014). During the adolescent period, “boys and girls go through puberty related changes, explore their sexuality, further develop their gender identities, attitudes and behaviors” (Amin and Chandra-Mouli, 2014, p. 2). While it is theorized that early adolescence is a critical time for gender socialization, the evidence as to specifically how and when these processes unfold is still emerging. While a body of qualitative literature suggests that the onset of puberty triggers certain gender socialization pressures, quantitative longitudinal data on how gender attitudes evolve over the course of early adolescence is actually relatively scarce and inconclusive (Kagesten, 2016).

The process of social change is complex and requires initiatives that apply gender transformative approaches to constructively engage men and empower women while also taking a systems approach, addressing multiple factors operating in the ecological system. Both women and men shape and perpetuate gender norms, and thus true social change must come from gender synchronized approaches which address a system and set of relationships (Greene and Levack, 2010). A systematic review published by the World Health Organization presents strong evidence that programs designed to engage men and boys can be successful in increasing gender equity (Barker et al., 2007). The interventions tested in this research were developed in the tradition of gender transformative approaches which seek to engage both men and women to critically reflect, question, or change institutional practices and broader social norms that create and reinforce gender inequality and vulnerability for men and women.

There is increasing evidence that programs which aim to promote gender equitable attitudes must expand beyond a tight focus on individuals to target their interpersonal relationships and wider social environments (Kagesten, 2016). Research suggests that working at multiple levels of the community (not just with 10-14 year olds, but also with their parents, and wider networks) will be most effective at catalyzing lasting and positive gender transformations among youth (Svanemyr et al., 2015). The work of Sen (1999) shows that environmental factors such as culture and social norms have key influence on the behaviors and attitudes, and thus on health outcomes. A review by Lundgren (2013) shows that programs which focus only on girls have limited effects on changing their experience with violence. Blum et al. (2012) provide a model for adolescent health which stresses the importance of ecological and social factors. Drawing on quantitative data on Nepalese women's decision-making power, Acharya et al. (2010) remarks that, "supporting community-based programmes increases poor women's participation to develop their capacity, to raise awareness, to build confidence and to develop leadership" (p. 10). Indeed, engaging with actors across multiple levels of a community is now generally considered the optimal approach to improve the lives of adolescents. Parents and families are considered particularly important actors in the social environment and programs have emphasized parent and family involvement (WHO, 2007). This research adds to a growing body of research about the additional impacts and benefits of working not just with adolescents to improve gender equity, but also with their parents and greater community.

1.4. Intervention Description

This study is testing the additional impact of implementing parent (Voices) and community (Promises) interventions on early adolescents who participate in Choices.

1.4.1. Choices

This intervention contains activities for VYA boys and girls to help them discover alternatives to conventional gender roles and behaviors. Choices was one of the first interventions targeting VYAs for attitude and behavior change related to gender norms. The Choices curriculum includes nine age-appropriate and developmentally-appropriate participatory activities designed to stimulate discussion and reflection between girls and boys. The activities explore the following themes:

- Gender inequity and power
- How gender equity begins with small actions that can earn respect
- How boys can be respected even if they treat girls as equals
- How social norms restrict boys from treating girls as equals
- How boys and girls collectively realize their hopes and dreams
- Understanding the roles of boys in empowering girls to achieve their dreams

In 2010, Georgetown University's Institute of Reproductive Health (IRH) conducted an evaluation of the Choices curriculum to test whether participation resulted in changes in attitudes and behaviors related to gender norms. Findings showed statistically significant differences in gender attitudes and behaviors between control and experimental groups after participation in Choices (Lundgren et al., 2012). Quantitative and qualitative findings included:

- Girls felt empowered to talk to their parents about continuing their studies and avoiding early marriage.
- Brothers advocated with their parents for their sisters' education and delayed marriage.
- Boys were able to recognize unfair gender norms.
- Brothers helped their sisters with schoolwork and housework.
- Children's perceptions of gender roles were altered, and VYAs were more accepting of non-traditional gender roles.
- Choices provided VYAs with the ability to recognize when gender norms were unfair.
- Participants felt more confident discussing feelings and promoting gender equality.

These results suggest that implementation of the Choices curriculum at a greater scale, along with complementary activities for parents and communities, has the potential to make meaningful contributions to efforts to achieve more equitable gender norms. An

PROGRAMS AND AREAS OF CHANGE

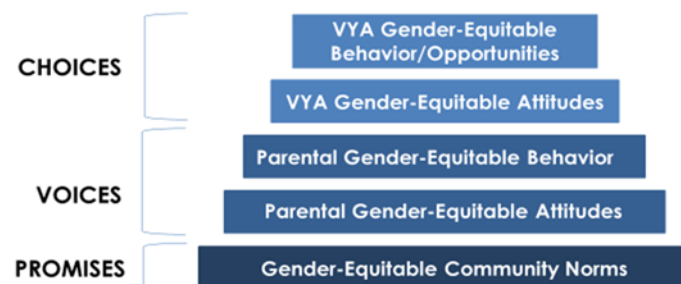


Figure 3. Programs and areas of change

adapted Choices curriculum is being used in Bangladesh, Bolivia, Egypt, El Salvador, Ethiopia, Malawi and Zambia, and is currently being adapted in Somalia.

1.4.2. Promises

In 2011, Save the Children sought to develop a new innovation to help shift community behaviors that would lead to greater gender equity for VYAs. The end result was Promises, a communication approach targeting community members. The purpose of this intervention was two pronged: to promote girls' education and reduce domestic violence, because it was believed that communities that promoted and practiced these changes would raise VYAs with more gender equity. It was hoped that by working on these two normative behaviors at the community level, a context would be created in which individual changes inspired through the Choices curriculum would be sustained – rather than fleeting – improvements. The Promises approach involves putting a series of large posters on display in the community designed to play to six evidence-based “influence principles.” Each poster was displayed for two weeks to catalyze dialogue and reflection at the community level.

In 2012, a mixed-method process evaluation was conducted using structured interviews and focus group discussions (FGD) with VYAs and parents. Husbands became more positive in their view of their daughters' ability to contribute to the community in the future and expressed increased understanding of the need for their daughters to delay marriage. VYAs self-reported an increase in optimism towards educational achievement and identified an increase in love and openness from both parents in discussing their hopes and dreams. All respondents reported community changes – decreased alcohol consumption, increased use of loving words to solve disputes, and decreased disputes.

Through the process of evaluating Promises, Save the Children has learned that this approach is successful at engaging the wider community, igniting dialogue and demand for change. The evaluation did not measure actual social and behavior changes, nor the synergistic effects of using Promises simultaneously with Choices. In 2013, Promises was adapted in northern Uganda to support a positive fatherhood project ([The REAL Fathers Initiative](#)) and in 2014, it was adapted in Ethiopia to be used alongside Choices.

1.4.3. Voices

In 2014, Save the Children developed the third component of the gender norms package. Voices challenges existing beliefs and attitudes held by parents on conventional and restrictive gender roles and their gendered expectations of their children, while fostering intergenerational dialogue about gender equity in the household.

The Voices approach seeks to catalyze parents to use their voices to:

- challenge the restrictive gender norms they grew up with and are still playing out in their relationships and homes;
- dialogue with their VYAs openly in a way that supports positive gender norm formation; and be role models that guide and teach girls and boys, nonviolently.

To develop Voices, Save the Children tapped into the voices of parents of VYAs whose children had been through Choices and displayed targeted gender equitable behaviors in the household, and now uses their testimonials to influence other parents to support gender equality at the household level. Through small group discussions among parents Save the Children and partners used these testimonials as a springboard to influence more parents in the community to adopt the following behaviors and attitudes:

- Allow and encourage more equitable gender roles in their homes, such as boys helping with household chores and giving girls more time to study and delay marriage;
- Speak with VYAs about changing norms and expectations for girls and boys (and be open to discussing these topics with their children); and
- Ask VYA boys and girls, about their hopes and dreams to encourage life aspirations and connections.

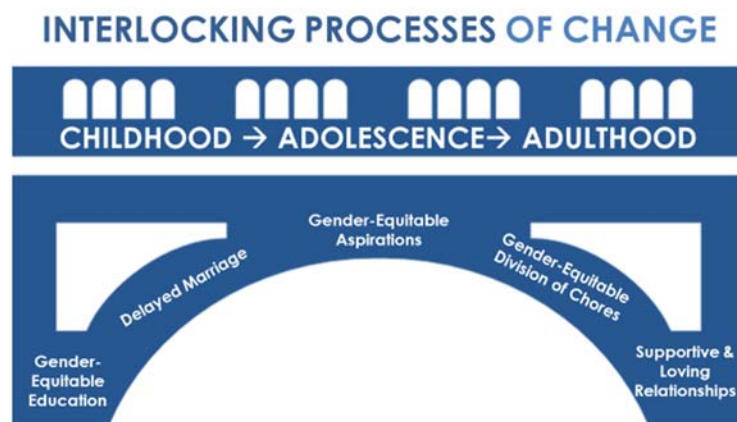


Figure 4. Interlocking processes of change

gender norms among children, parents, and community members can (trans)form gender attitudes and norms resulting in synergies across domains which build a bridge to healthy, productive adulthood.

The combined gender norms intervention package tested in this study is based on the understanding that there are five interlocking domains (education, marriage, aspirations, division of chores, and relationships) in which adolescents operate over the life course. Each of these domains is strongly influenced by gender schema. The theory of change driving the combined intervention package is the proposition that activities that catalyze critical reflection of

2. STUDY OBJECTIVES

2.1. General Objective

The purpose of this study was to evaluate a multi-level intervention to determine if there are additional benefits of working at the family and community level while also engaging VYAs to improve gender equity and attitudes.

2.2. Research Question and Study Variables

How do changes in attitudes, norms, and behavior among VYAs who participate in the Choices curriculum differ from those who engage in the Choices curriculum, while their parents and community also participate in Voices and Promises?

The independent variable in this study is parent/community participation in the Voices and Promises curriculum. Parent participation in the intervention was verified in intervention questions at the beginning of the parent's questionnaire. Table 1 presents the key dependent variables (outcomes) measured in the VYA survey.

Table 1. Dependent variables for VYAs

Dependent Variables		
Category	Attitudes and Norms	Behaviors
Aspirations	<ul style="list-style-type: none">Boys and girls can imagine a life in which men and women have equal opportunities.Boys and girls feel they can achieve their aspirations.	<ul style="list-style-type: none">Boys and girls talk about their aspirations, hopes and dreams with each other.
Gender Roles	<p>Attitudes:</p> <ul style="list-style-type: none">VYAs believe boys and girls can do the same household tasks.VYAs feel comfortable dividing household tasks equally between boys and girls.VYAs acknowledge risk of early marriage.VYAs favor delayed marriage for girls.Girls favor delaying own marriage. <p>Norms:</p> <ul style="list-style-type: none">Girls believe others important to them are delaying marriage.VYAs believe others important to them are dividing household tasks equally between boys and girls.VYAs believe others important to them think they should divide tasks equally between boys and girls.	<ul style="list-style-type: none">Boys and girls engage in activities or tasks typically assigned to people of the opposite gender.

Relationships	<ul style="list-style-type: none"> Boys and girls value relationships based on equality, respect and intimacy. Boys and girls expect to make decisions jointly with their spouses. VYAs value the role of men nurturing their wives and children as well as providing financial support. 	<ul style="list-style-type: none"> Boys take action to improve the lives of their sisters, and vice-versa, or openly express love and affection for those sisters. Boys and girls do not tease their peers for behaving in ways which are not consistent with conventional gender norms.
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In order to better understand the process of change, we also looked at changes among parents, collecting data on the variables presented in the table below.

Table 2. Dependent variables for parents

Dependent Variables		
Category	Attitudes and Norms	Behaviors
Aspirations	<p>Attitudes</p> <ul style="list-style-type: none"> Parents value education equally for girls and for boys. Parents believe that the benefits of girls finishing school are greater than the benefits of marrying early. Parents believe that both daughters and sons have equal ability to become educated. Parents believe educating their daughter will benefit their own family, not just the family she will marry. Parents believe daughters should have aspirations beyond marriage and motherhood. <p>Norms</p> <ul style="list-style-type: none"> Parents believe others important to them intend to send their daughters to school until 18. Parents believe others important to them think they should send their daughters to school until 18. 	<ul style="list-style-type: none"> Intends to send daughter to school until 18. Commit to not discussing their daughters' marriage with potential husbands and their families until she has completed her education. Ask both daughters and sons to share their aspirations. Provides equal support to sons and daughters to achieve their aspirations.

Gender roles	<p>Attitudes</p> <ul style="list-style-type: none"> • Accept nonconventional gender roles. • Parents believe that boys and girls can do the same household tasks. • Parents comfortable dividing household chores equally between boys and girls. • Parents value homework equally for boys and girls in light of conflicting demands on their time. • Parents value boys and girls having equal time off from household tasks. <p>Norms</p> <ul style="list-style-type: none"> • Parents believe others important to them feel household chores should be shared equally between boys and girls. • Parents believe others important to them feel they should ensure that their sons and daughters share household chores equally 	<ul style="list-style-type: none"> • Parents divide household work and responsibilities equally between girls and boys. • Parents provide their sons and daughters equal time off from household tasks to work on their homework. • Parents provide equal amounts and same quality of food for daughters and sons.
Relationships	<ul style="list-style-type: none"> • Value relationships based on equality, respect, and intimacy with both sons and daughters 	<ul style="list-style-type: none"> • Parents display, equally to daughters and sons, various actions for encouragement and hope, such as telling children they are proud of them, listening to them and setting high aspirations for them.

2.2.1. Hypothesis

Changes in gender attitudes, norms, and behaviors among VYAs whose communities engage in Voices and Promises will be greater than those observed among VYAs who only participate in Choices. In addition, changes in gender attitudes, norms and behaviors will be greater among parents in the experimental as compared to the control arm.

3. STUDY METHODS

3.1. Research Design

This study was conducted in the Kapilvastu District in the Terai Region of Nepal, where Save the Children worked with over 300 child clubs, reaching about 9,000 VYAs. Four Village Development Committees (VDCs)¹ (Dhanakauli, Jahadi, Mahuwa, Niglihawa) were selected, representing 36 child clubs (one club per ward, and nine clubs per VDC), and nearly 1,000 VYAs. Two VDCs were assigned to the experimental group (Dhanakauli and Jahadi), and two were assigned to the control group (Mahuwa and Niglihawa). Both groups were matched on indicators relating to access to roads and schools, as well as socio-economic characteristics. In order to test the additional value of a multi-level intervention, a two arm study design was conducted. In the control arm, participant VYAs engaged in the Choices program. In the experimental arm, VYAs engaged in Choices, while parents participated in Voices, and the community received Promises.

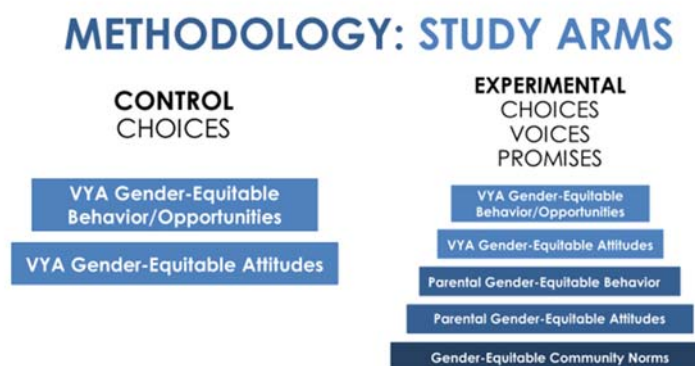


Figure 5. Methodology: study arms

Use of a control group allowed identification of potential confounding historical effects of other events and educational programs which may have caused changes in attitudes or practices among young people or parents. Pretest measurements assessed the comparability of the control and experimental groups before intervention. Thus, any differences between control and experimental groups at end line can reasonably be attributed to the intervention. The potential for contamination between study groups was low because the VDCs selected for control and experimental groups were not close together. The VYAs did not attend the same school, and the club facilitators were different. Implementation activities were monitored to determine whether they were implemented as per the design.

The study protocol, consent forms, and tools were approved by Georgetown University and the Nepal Health Research Council. Parents provided consent for themselves and their children, and children provided assent. The enumerators first approached the parents, obtaining written consent for their own and their children's participation in the study.

¹ A Village Development Committee (a lower administrative organization of village, made up of nine wards) has an elected chief, in addition to the elected Chief of each ward level.

Subsequently, the enumerators invited the VYAs to participate, interviewing them after they provided written assent.

3.2. Data Collection

3.2.1. Baseline and End line surveys

Baseline data collection took place in April 2015, approximately one month before the intervention began. End line data collection took place in April 2016 three months after intervention activities ended. A total of 900 participants in each arm (300 girls, 300 boys, and 300 parents) completed structured interviews at baseline and end line. The sample size was determined by power calculations (using type I and type II errors of 0.05 and 0.1 respectively) which suggested that 272 boys and 272 girls in each arm would be sufficient to detect a 10% increase in outcome variables of interest between groups. This calculation was based on two behavioral and one gender attitude outcomes from the Choices evaluation in Nepal; 1) an increase from 70 to 90% of brothers helping their sisters with school work; 2) an increase from 60 to 80% of boys participating in household chores; and 3) an increase in the score on a gender equitable attitudes scale from 40 to 80%.

Save the Children worked with their partner NGO in Kapilvastu district to identify local enumerators with a university education, seeking an equal amount of male and female enumerators, to allow for same sex interviews. Ultimately, the recruitment yielded 12 enumerators of which only four were females. At baseline and end line, the local researcher and Save the Children's Monitoring and Evaluation officer conducted a three-day training to enable the 12 enumerators and M&E officer of the partner NGO to collect good quality data following ethical standards. The training sessions included a detailed discussion on each of the research questions, the interactive, game-based approach of the survey instrument, the challenges that could arise during data collection and how to ethically conduct interviews with younger adolescents. Enumerators were also trained and certified in research ethics. The enumerators pre-tested the questionnaire in Araurakot village of Jahadi VDC before beginning data collection.

Interviews with the children were conducted in private in the location of their choice, most often their home, and lasted about 45 minutes. Children were asked about their gender beliefs and attitudes, perceptions of social norms, and behaviors related to education, marriage, household chores, self-advocacy, and communication with their parents. Parent interviews lasted about one hour and took place in a private location, most often their home. Parents were asked about their gender attitudes, expectations for their children, and how frequently they performed certain activities with their children. The interview consisted of games and other age-appropriate activities such as a card game to assess gender norms and attitudes, discussion of vignettes portraying gender-related issues girls and boys face, and a series of questions about parent-child communication and time use. Participants were also asked to sort photographs of common activities (such as washing dishes, carrying wood, and studying) into piles according to how frequently they performed each activity during the last week. They then repeated the activity for their

brother/sister. For further details, see the parent and VYA survey instruments included in **Appendices A and B**.

3.2.2. In-depth interviews with VYA and Focus Group Discussions with Parents

Qualitative data was collected to provide insights into participation in Choices, Voices, and Promises and to explore the effect of rolling out the three components simultaneously. The results from the in-depth interviews and FGDs were used to triangulate the survey data, and provide deeper understanding of the role that parents play in their children's lives. A total of five focus group discussions, each with six to eight participants, were conducted with parents in control and experimental areas. In-depth interviews were conducted with 12-14 year old girls, a total of 30 interviews were conducted, 15 with girls in the control group VDCs and 14 with girls in the experimental VDCs. Eligibility criteria included participation in at least five of the nine Choices sessions, with one of their parents attending at least one of the Voices video sessions (experimental group only).

Table 3. Number of participants in in-depth interviews and focus group discussions

	Control	Experimental
Girls (in-depth interview)	15	14
Mothers (FGD)	1	1
Fathers (FGD)	1	1
Mixed (FGD)	1	n/a

Focus groups with parents were held in the school or facility where the Voices group dialogue sessions were held. The discussions lasted about two hours and consisted of a series of participatory activities. The facilitators were trained to create an environment in which participants felt free to share their opinions, and to disagree with one another. Photo elicitation and vignettes were used to keep parents engaged and avoid direct questions to reduce courtesy bias. For example, parents were shown a picture of a family and told a story about a mother and father discussing how quickly their daughter is growing up and whether they should start arranging her marriage, now that she had reached the age of 14. Participants were asked to complete the story, comment on their discussion and reflect on how they might react in such a situation (see Focus Group Guide in **Appendix C**).

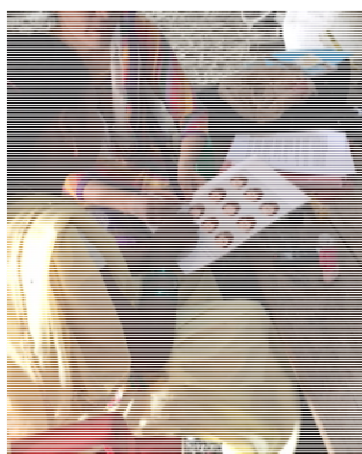


Figure 6. Dolls and emotion cards used in qualitative interview

The in-depth interviews used a variety of techniques to keep the girls engaged. The interview centered on use of a family of small dolls, Amita (sister), Bibek (brother) and their parents, and grandparents. During the interview, the participant was given the dolls and encouraged to act out situations set out by the interviewer (see In-Depth interview guide in **Appendix D**). The girls were encouraged to reflect on these situations in light of their personal experiences. For

example, the interview asked them if that particular situation had ever happened to them. Cards depicting a range of different emotions were also used so that the girls could point to an emoticon when asked how they felt about a particular situation in an effort to help them express a full range of potential emotions. For example, “Let’s imagine that Amita and Bibek have been studying hard and they arrive home to find there is even more house work today than usual. Amita and Bibek have an important exam at school next day, but the family needs help. What do they do?” These techniques were used to reduce the need for written literacy, lay a foundation of trust and rapport and serve as a projective technique to encourage honest perspectives. Role playing and storytelling made it easier for children to discuss more difficult, abstract concepts, and provided a focus other than the interviewer which encouraged them to share their feelings and ideas.

3.3. Data Analysis and Measure Development

3.3.1. Data Management and Analysis

Recordings of the focus groups and interviews were transcribed in Awadhi and then translated into English. Transcripts were coded and content analysis conducted to identify any differences in gender attitudes and behaviors between the VYAs from the control and experimental groups. Quotes were selected as exemplars.

Survey data were entered and cleaned by Nepali consultants in Kapilvastu. The quantitative data were analyzed using SPSS software by analysts in Nepal and the U.S. Following quality assessment, moderate and high quality measures were analyzed with respect to intervention effect. For each measure, we estimated logistic or linear regression models for dichotomous and continuous outcomes respectively. For each moderate and high quality end line measure, we assessed construct validity using the baseline data. Where measure quality was acceptable at baseline, we used both datasets for evaluation, and assessed the difference in change over time in the measure comparing the intervention

areas to the control areas. Where only end line measures were of sufficient quality, models assessed differences in end line outcomes between control and intervention areas. For each outcome, adjusted models were also estimated to assess for potential confounding by gender and age group.

As part of the quality assessment process, parent responses were linked to VYA responses to assess relationships between parent and VYA measures. Of the 600 parents who were interviewed at end line, 18% (n=109) had no VYA code recorded and could not be linked to VYA data. An additional 11% (n=64) had a VYA code recorded that did not match a VYA code in the VYA dataset and could also not be linked to VYA data. Thus, a total of 71% (n=427) parents at end line were linked to VYAs. Of the successfully linked data, there were nine cases where two parents were linked to the same VYA (n=18 parents). Among the 1,200 VYA who were interviewed at end line, all had identifying codes recorded. There were 59 VYAs (5%), however, who were dropped before linking because their codes were not unique. There were 28 cases where two VYAs had identical codes (n=56) and one case where three VYAs had identical codes (n=3). Of the remaining linkable VYAs, 418 were successfully linked to parents, including 9 VYAs who were linked to two parents. While the VYA linkage rate appears low (418/1,200; 35%), by design only half of VYAs' parents were interviewed, so the 71% linkage rate from the parent data is most relevant.

3.3.2. Measure Development

Relatively little research has been conducted with VYAs compared to older adolescents. Consequently, there is a well-recognized need for high quality measures that have specifically been validated with this younger population (Blum et al., 2014). A recent systematic review of research on gender attitudes among VYAs found that prior studies, which have largely been conducted in the U.S. and Western Europe, have used widely varying measures making it difficult to compare study findings (Kagesten et al., 2016). This study contributes to filling this gap by presenting a detailed quality assessment of measures for gender norms, attitudes, and behaviors for use with VYAs and their parents.

The focus of this section is the identification of moderate and high quality measures for VYA and parent norms, attitudes, and behaviors in five gender domains (Figure 4). Baseline and end line moderate and high quality measures were used to evaluate the effect of adding the parent (Voices) and community (Promises) components to the VYA gender transformative Choices intervention. For the initial quality assessment of measures we used the end line dataset, which included 1,200 VYAs ages 10-14 and 600 of their parents. We used the end line data because of apparent inconsistencies on a few variables which suggested some quality issues in the baseline data. For subsequent quality assessments and evaluation of the intervention we also used the baseline dataset, which also included 1,200 VYAs and 600 parents.

Scale Development and Initial Measure Selection. For potential scales, we calculated Cronbach's alpha for groups of theoretically related items. Potential scales with $\alpha > 0.6$ were evaluated further. We assessed dimensionality using principal component analysis and parallel analysis. Next we used exploratory factor analysis, followed by iteratively

removing low-loading items and re-estimating models. For each subscale, we estimated means, ranges, and Cronbach's alpha. Scales that were strongly skewed (e.g. >50% with highest possible score) were dichotomized for further analyses. Scales were initially developed using a randomly selected half of the end line sample and validated using the second half of the sample. For VYAs, subsequent analyses indicated measurement variance by gender, so we redeveloped scales using the full end line sample split by gender. For domains in which there were no suitable scales, we selected promising single item measures from the dataset. Measures were considered to have major quality concerns with respect to range if dichotomous items were endorsed by more than 90% of participants and major quality concerns with respect to missing data if more than 10% of responses were missing. Measures were considered to have minor range quality concerns if dichotomous items were endorsed by more than 80% of participants and minor missing data concerns if more than 5% of responses were missing. For ease of interpretation, where possible dichotomous items and scales were coded so that higher values indicated more gender equitability.

Construct Validity. We then assessed the construct validity of selected measures by evaluating associations with other measures within the same domain. For example, we assessed associations between VYA attitudes about gender equitable education and VYA norms about gender equitable education. We used logistic regression models for dichotomous outcomes and linear regression models for continuous outcomes. We assessed unadjusted associations as well as associations adjusted for age group, gender, and intervention. Some parent measures involved questions about daughters or sons specifically. For some of these measures, we included responses about both male and female children and estimated models with robust standard errors that account for clustering of multiple children per parent. For measures where the outcome involved gender differences (e.g. parent reports of daughters and sons time spent doing chores), the significance of the interaction between the effect of gender and the effect of the exposure of interest was assessed. We then assessed relationships between VYA measures and analogous parent measures for child/parent dyads that could be linked.

Results of Scale Development: Parents. The groups of items that that we explored as potential scales for the parent data are listed by domain in Table 4. Of the eight potential scales that we tested, the two potential scales that demonstrated high internal consistency were for gender equitable education attitudes ($\alpha=0.83$) and gender equitable aspirations attitudes ($\alpha=0.81$). The other six potential scales had poor internal consistency, suggesting that they did not assess a common construct, and were not explored further.

Following iterative principle components analysis and exploratory factor analysis, two low-loading items were removed from the gender equitable education attitude scale, for a final scale of four items (see green-shaded items in Table 4). The properties of the scale were similar in the validation random half-sample. In the full end line sample the 4-item final scale had an alpha of 0.93 and scores ranged from 0 to 4 with a mean of 3.1 ($SD=1.5$). Because of the strong skew, the scale was dichotomized for analyses to compare parents who scored 4 (62%) to all others with lower scores.

The gender equitable aspirations attitude scale performed well in exploratory factor analysis and all items were retained. Results were similar in the validation sample. In the full sample the scale had an alpha of 0.80 and scores ranged from 0 to 11, with a mean of 7.9 (SD=2.6).

Table 4. Potential parent scale items by domain

Potential Scale	Alpha ^a
<i>Gender Equitable Education Attitude</i> (6 potential items, each with agree/disagree response options): For a boy to succeed in the community, it is very important that he complete education to age 18 ^b For a girl to succeed in your community, it is very important that she completes education to age 18 In general, girls can do just as well at school as boys When a girl is educated until age 18, it is the girl's future husband's family who will benefit the most When a boy is educated until age 18, it is the boy's future wife's family who will benefit the most If a family can only afford for one child to go to school it should be the boy	0.83
<i>Gender Equitable Education Behavior (Sons)</i> (3 potential items, each with never/once/often response options): How often in the past month have you encouraged your son to stop doing a household chore and study instead How often in the past month have you helped your son find good place to study How often in the past month have you helped your son complete homework	0.15
<i>Gender Equitable Education Behavior (Daughters)</i> (3 potential items, each with never/once/often response options): How often in the past month have you encouraged your daughter to stop doing a household chore and study instead How often in the past month have you helped your daughter find good place to study How often in the past month have you helped your daughter complete homework	0.22
Gender Equitable Household Chores Norm (5 potential items, each with agree/disagree response options): Sons are able to do tasks usually reserved for daughters, like chopping vegetables and washing clothes Daughters are able to do tasks usually reserved for sons, like chopping wood and washing clothes If my son wanted to do tasks usually reserved for daughters, I would be upset If my daughter wanted to do tasks usually reserved for sons, I would be upset Boys should have more free time than girls	0.59
<i>Delaying Marriage Attitude</i> (4 potential items, each with agree/disagree response options):	0.52

Parents who marry their daughters are doing the best thing to secure her future A girl who is educated before she gets married will have a better life If a family can only afford for one child to go to school it should be the boy Marrying girls at an early age is bad for the community	
Supportive and Loving Relationships Behavior (Sons) (4 potential items, each with never/once/often response options): How often in the last week did you smile at your son How often in the last week did you tell your son that you are proud of him How often in the last week did you have a long conversation with your son How often in the last week did you tell your son that you have high expectations for him	0.42
Supportive and Loving Relationships Behavior (Daughters) (4 potential items, each with never/once/often response options): How often in the last week did you smile at your daughter How often in the last week did you tell your daughter that you are proud of her How often in the last week did you have a long conversation with your daughter How often in the last week did you tell your daughter that you have high expectations for her	0.44
Gender Equitable Aspirations Attitude (11 potential gender role card sort items, each with response options of both men and women vs. only men or only women): Chairman of the child club ^b Take care of the children Clean house Cook Participate in community meetings Shop for household goods Make decisions about children's welfare Take children to the doctor Decide on financial matters at home Work outside the home Earn	0.81

^a Cronbach's alpha for full potential scale, estimated with the random half development sample.

^b Items included in final scales are shaded in green.

Results of Scale Development: VYAs. Scales were initially developed using the VYA data in the same manner as for the parent data. Following scale development, however, it became apparent that several of the scales exhibited measurement variance by gender. This is consistent with evidence that boys and girls undergo different gender socialization processes. Thus, we redeveloped scales by gender using the full end line sample for boys and girls separately. These gender subsamples were not randomly split because of the reduction in sample size. The full list of items that were considered for scales are in Table 5, with Cronbach's alphas for boys' and girls' end line data. For girls, the following five groups of items exhibited high internal consistency: Gender equitable household chores timeline behaviors (alpha=0.66), delaying marriage attitudes (alpha=0.82), supportive and loving sibling relationships attitudes (alpha=0.63), gendered teasing behaviors (alpha=0.77), and

gender equitable aspirations attitudes ($\alpha=0.77$). For boys, the following five groups of items exhibited high internal consistency: Gender equitable household chores weekly behaviors ($\alpha=0.63$), delaying marriage attitudes ($\alpha=0.87$), supportive and loving sibling relationships attitudes ($\alpha=0.67$) and behaviors ($\alpha=0.80$), and gender equitable aspirations attitudes ($\alpha=0.91$). One of the promising domains, gender equitable aspirations attitudes, resulted in a scale with good properties for both girls and boys. Scores for this eleven-item scale ranged from 0 to 11 and had a mean of 8.2 ($SD=3.1$) and $\alpha=0.87$.

Sub-Scale Development: VYA Girls. Three subscales were developed out of the four domains with promising scales specifically for girls (Table 5). The delaying marriage attitudes domain resulted in two subscales. The consequences of early marriage subscale (items shaded in green) included five items ($\alpha=0.75$). Scores ranged from 0 to 5 with a mean of 4.6 ($SD=1.0$). Because of the strong skew, the scale was dichotomized for analysis to compare those scoring 5 (79%) to all others. Similarly, a benefits of delayed marriage subscale included seven items (items shaded in blue) ($\alpha=0.79$). Scores ranged from 0 to 7 with a mean of 6.5 ($SD=1.2$). This scale was also dichotomized for analysis to compare those scoring 7 (79%) to all others with lower scores. A three-item gendered teasing behaviors scale was also developed for girls ($\alpha=0.66$), with scores ranging from 0 to 4 and a mean of 0.8 ($SD=1.2$). For analysis this scale was dichotomized to compare those scoring 0 (65%) to all others.

Sub-Scale Development: VYA Boys. Two additional scales were developed specifically for boys. The gender equitable household chores behavior included four items and had $\alpha=0.63$ in the end line sample. Scores ranged from 0 to 12 with a mean score of 6.5 ($SD=2.9$). A supportive and loving sibling relationships behavior scale was developed with three items ($\alpha=0.80$). Scores ranged from 0 to 12 with a mean of 6.6 ($SD=3.4$).

Table 5. Potential VYA scale items by domain

Potential Scale	Girls Alpha a	Boys Alpha a
<i>Gender Equitable Education Attitude</i> (5 potential items, each with agree/disagree response options): The most important aspiration for a girl is to be a mother and take care of her family For Boys: When I get married, I would rather that my wife be educated than obedient / For Girls: When I get married, I would rather be educated than obedient If a family can afford for one child to go to school it should be the boy It is more important for a girl to help at home and learn household activities than to spend time studying Education for girls is important to get love and respect from a husband's family	0.52	0.41

<p>Gender Equitable Household Chores Attitude (4 potential items, each with agree/disagree response options):</p> <p>Boys should have more free time than girls</p> <p>Boys should share the work around the house with women such as doing dishes, cleaning and cooking</p> <p>It is more important for a boy to help at home than to spend time hanging out with friends.</p> <p>In a family, girls and boys should get the same amount to eat no matter how much food there is.</p>	0.38	0.04
<p>Gender Equitable Household Chores Behavior (4 potential items, each with never/once/more than once/daily response options):</p> <p>How often in the past week have you washed dishes^b</p> <p>... accompanied mother</p> <p>... helped with chores</p> <p>... made the bed</p>	0.25	0.63
<p>Gender Equitable Household Chores Behavior (5 potential timeline items, each with responses in hours spent per typical weekday):</p> <p>Doing chores</p> <p>Relaxing or playing</p> <p>After school activities</p> <p>Working for others</p> <p>Sleeping</p>	0.66	0.35
<p>Delaying Marriage Attitude (25 potential vignette items, each with yes/no response options):</p> <p>If Maiya stops school and gets married now, what will Maiya's life be like in ten years? ...</p> <p>She will have lots of housework</p> <p>She will have little housework</p> <p>Life will be challenging</p> <p>Life will be pleasant</p> <p>She will have many children</p> <p>She will have some children</p> <p>She will have health problems</p> <p>She will be in good health</p> <p>She will have a difficult relationship with her husband</p> <p>She will have a happy relationship with her husband</p> <p>How will Maiya feel about stopping school and getting married? ...</p> <p>Happy</p> <p>Sad</p> <p>If Maiya finishes her education and then gets married, what will her life be like in ten years? ...</p> <p>She will have lots of housework</p> <p>She will have little housework</p> <p>Life will be challenging</p> <p>Life will be pleasant</p>	0.82	0.87

She will have many children She will have some children She will have health problems She will be in good health She will have a difficult relationship with her husband She will have a happy relationship with her husband How will Maiya feel if she finishes school and then gets married? ... Happy Sad		
<i>Supportive and Loving Sibling Relationships Attitude</i> (2 potential agree/disagree items and 12 potential vignette items with yes/no response options): It is important for siblings to tell each other that they love each other A boy who expresses his affection for his sister is weak What advice would you give Arun? ... He should stop helping his sister. He should talk to his parents about his feelings He should help his sister He should talk to his sister about his feelings He should ask a family member or other adult to talk to his parents What advice would you give Arun's sister? ... She should tell her parents how much she appreciates Arun's help She should tell Arun not to help her because it is causing problems She should let Arun know how much she appreciates him She should ask a family member or other adult to talk to her parents	0.63	0.67
<i>Supportive and Loving Sibling Relationships Behavior</i> (4 potential items, each with never/once/more than once/daily response options): How often in the past month did you pray for the wellbeing or success of your sister or brother ... express appreciation to your brother or sister ... help brother or sister with school work ... help brother or sister with chores	0.34	0.80
<i>Supportive and Loving Relationships Gendered Teasing Behavior</i> (3 potential items, each with never/once/more than once response options): For Boys: During the last month, has a friend teased another boy for acting like a girl? / For Girls: During the last month, has a friend teased a girl for acting like a boy? For Boys: During the last month, have you been with any friends who were teasing girls? / For Girls: During the last month, have you been with any friends who were teasing boys? In either of those cases, did you tell them not to tease?	0.77	0.35
<i>Gender Equitable Aspirations Attitude</i> (11 potential gender role card sort items, each with response options of both men and women vs. only men or only women): Chairman of the child club	0.77	0.91

Take care of the children	
Clean house	
Cook	
Participate in community meetings	
Shop for household goods	
Make decisions about children's welfare	
Take children to the doctor	
Decide on financial matters at home	
Work outside the home	
Earn	

^a Cronbach's alpha for full potential scale, estimated with the random half development sample.

^b Items included in final scales are shaded in green or in blue, indicating sub-scales.

Construct Validity and Overall Quality Assessment of Parent Measures. For all potential parent measures, overall measure quality was assessed by considering range and missing data, associations with theoretically related constructs, and associations with analogous VYA constructs (Table 6). Details on range and missing data for each measure are presented in Table S1 in **Appendix E** and detail on construct validity analyses are presented in Figure S1 in **Appendix F**. The associations with other theoretically related constructs were central to overall quality assessment. Overall, parent measures exhibited poor construct validity with most measures showing no association with other theoretically related measures. The poor performance of these measures limited our ability to assess the effect of the intervention on parents. However, in one domain, delayed marriage for girls, measures of parent attitudes and parent behaviors exhibited potentially strong construct validity. Among parents with daughters, those who agreed that marrying girls at an early age is bad for the community reported that they wanted their daughters to marry on average 1.1 years later than those who disagreed (95% CI: 0.5-1.6). This association remained unchanged after adjusting for parent gender, age, and intervention area (adj. beta=1.1 [0.5-1.7]). These measures of parent attitudes and behaviors about delayed marriage were not associated with analogous VYA measures, so they were assessed to be of moderate quality.

Table 6. Summary of parent measure quality

Measure	Range and Missing Data Issues ^a	Related to other Parent Constructs ^b	Related to VYA Constructs	Overall
<i>Gender equitable education</i>				
Norm: What level of education do most girls in this community complete?	None	0/3		Weak
Attitude (1): For a girl to succeed in your community, it is very important that she completes education to age 18 (agree)	Minor	0/2		Weak

Attitude (2): Dichotomized 4-item gender equitable education attitudes (scoring 4/4)	Major	0/2		Weak
Behavior (1): Children's daily hours spent studying or in school	None	0/3		Weak
<i>Gender equitable household chores and resource sharing</i>				
Norm: Think of the people you admire. How do they usually divide household tasks between sons and daughters? (share housework equally)	Minor	0/4		Weak
Attitude (1): Boys should have more free time than girls (disagree)	Minor	0/3		Weak
Attitude (2): If my child wanted to do tasks usually reserved for opposite gender, I would be upset (disagree)	Minor	0/3		Weak
Behavior (1): Children's hours spent doing housework	None	0/3		Weak
Behavior (2): Children's hours of playtime	None	0/3		Weak
<i>Delayed marriage for girls</i>				
Attitude: Marrying girls at an early age is bad for the community (agree)	Minor	1/1	0/3	Moderate
Behavior (d): At what age would you like your daughter to marry?	None	1/1	0/1	Moderate
Supportive and loving relationships				
Attitude: When a child is not doing well in school, it is better to encourage them rather than to discipline them (agree)	None	0/1		Weak
Behavior: How often did you tell your child that you are proud of them? (often)	None	0/1		Weak
<i>Gender equity in aspirations for girls and boys</i>				
Attitude: Card sort gender role scale	None	0/1		Weak
Behavior (d): How often in the last year did you discuss with child their hopes and dreams for the future? (ever)	None	0/1		Weak

^a Minor range/missing data issues were dichotomous measures with >80% endorsement or >5% missing; major issues were missing >10%

^b Measures that were related to at least 1 other parent constructs within the same domain were considered moderate quality (no measures were associated with more than one other measure)

Construct Validity and Overall Quality Assessment of VYA Measures. We assessed the overall quality of VYA measures in a similar manner as parent measures (Table 7). Detail on range, missing data and construct validity are also summarized in Table S1 and Figure S1 (**Appendices E and F**). In total, ten measures exhibited moderate or strong quality

overall. These measures covered each domain except for supportive and loving relationships and are summarized subsequently.

Gender Equitable Education. We identified three measures of moderate or strong quality within the domain of gender equitable education, including a norm, an attitude, and a behavior. Each of these three measures was associated with each other in the expected direction. VYAs who agreed with the norm “in families I respect, boys and girls get equal time to do homework,” were more likely to disagree with the attitude “It is more important for a girl to help at home and learn household activities than to spend time studying” (OR=8.2, 95%CI: 5.3-12.7; aOR=5.9 [3.7-9.4]). Those who disagreed with the conventional attitude were in turn more likely to have told a parent that is important for them (or their sisters) to continue studying (OR=5.1 [3.7-7.1]; aOR=4.4 [3.2-6.2]). Additionally, endorsing the equitable norm was also associated with talking to parents about girls continuing to study (OR=5.8 [3.8-9.1]; aOR=4.8 [3.0-7.6]).

Gender Equitable Household Chores. Two measures of norms and two measures of attitudes were of moderate or high quality within the domain of gender equitable household chores and resource sharing. Each of these two norms was associated with each of the two attitudes respectively. VYAs who disagreed with the norm “boys who help with chores are considered weak by their friends” were more likely to disagree with the conventional attitude “Boys should have more free time than girls” (OR=2.2 [1.6-2.9]; aOR=1.8 [1.3-2.5]) and to agree with the equitable attitude “It is more important for a boy to help at home than to spend time hanging out with friends” after adjusting for confounders (OR=1.2 [0.7-1.9]; aOR=2.1 [1.2-3.6]). The second norm, agreement with equitable norm “my parents admire boys who help their sisters with household chores” was also associated with the attitude about free time (OR=4.2 [2.8-6.2]) and helping at home (OR=15.1 [9.3-24.4]) respectively (relatively high endorsement of the second attitude may contribute to the inflated odds ratio).

Delaying Marriage for Girls. Only one measure, for behavior, was of good quality within the domain about delaying marriage for girls. For boys, this behavior was talking to parents about delaying a sister’s marriage and for girls the behavior was talking to parents about when to get married. This behavior was associated with the two dichotomized attitude subscales for girls relating to delaying marriage. For girls, endorsing all of the negative consequences of early marriage was associated with increased odds of talking to parents about when they wanted to get married (OR=2.0 [1.3-3.0]; aOR=1.9 [1.3-2.9]), as was endorsing all positive consequences of delayed marriage (OR=2.6 [1.7-3.9]; aOR=2.5 [1.7-3.8]).

Gender Equity in Aspirations. Within the domain of gender equity in aspirations, one attitude and one behavior were of moderate or strong quality. The gender role attitude card sort scale was associated with talking about hopes for the future with a sibling or friend (OR=1.3 [1.3-1.4]; aOR=1.3 [1.2-1.4]). This attitude and this behavior were also each related to other measures of attitudes and behaviors that were of weaker quality.

Associations with Parent Measures. Because only half as many parents were interviewed as VYAs, and because the match rate between the parent and VYA datasets was only 71%, power was limited to assess associations between VYA and parent measures. Furthermore, there were few domains in which there were moderate or strong measures for both VYAs and parents. In the one domain with moderate quality parent measures, delayed marriage for girls, parent measures were not associated with analogous VYA measures.

Table 7. Summary of VYA measure quality

Measure	Range and Missing Data Issues ^a	Related to other VYA Constructs ^b	Related to Parent Constructs	Overall
<i>Gender equitable education</i> Norm: In families I respect, boys and girls get equal time to do homework (agree) Attitude: It is more important for a girl to help at home and learn household activities than to spend time studying (disagree) Behavior (1): Hours spent studying Behavior (2): Have you ever told your parents (guardian) that it is important for your sisters/you to continue studying? (yes)	Major Minor None None	2/3 2/3 0/2 2/2	 0/1 1/1	Moderate Moderate Weak Strong
<i>Gender equitable household chores and resource sharing</i> Norm (1): Boys who help with chores are considered weak by their friends (disagree) Norm (2): My parents admire boys who help their sisters with household chores (agree) Attitude (1): Boys should have more free time than girls (disagree) Attitude (2): It is more important for a boy to help at home than to spend time hanging out with friends (agree) Behavior (1): Hours spent doing chores Behavior (2s): Time task chore scale	None Minor None Minor None None	2/4 2/4 3/4 2/4 0/3 1/3	0/1 0/1 	Strong Moderate Strong Moderate Weak Weak
<i>Delayed marriage for girls</i> Norm: Think of the families you most admire. What would they say is the best age for Maiya to get married? Attitude (1): What would you say is the ideal age for Maiya to get married? Attitude (2d): For girls: Dichotomized 5-item negative consequences of early marriage scale (endorse all)	None None None	1/4 1/2 1/2	 0/1 0/1	Weak Weak Weak

Attitude (3d): For girls: Dichotomized 7-item positive consequences of delayed marriage scale (endorse all) Behavior: For boys: Have you ever talked to your parents about delaying your sister's marriage? For girls: I have talked to my parents about when I want to get married (agree)	None	1/2	0/1	Weak
	None	2/4	0/1	Strong
Supportive and loving relationships Attitude on sibling relationships: A boy who expresses his affection for his sister is weak (disagree) Attitude on gendered teasing: Boys who act like girls often get teased by their friends (disagree) Behavior for sibling relationships (1s): For boys: Sibling support scale Behavior for sibling relationships (2): How often did you help your sister or brother with chores? (ever) Behavior for gendered teasing (1): During the last month, has a friend teased a girl (boy) for acting like a boy (girl)? (never) Behavior for gendered teasing (2d): For girls: Dichotomized 3-item gendered teasing scale (no teasing behaviors)	None	0/2		Weak
	None	0/2		Weak
	None	0/1		Weak
	Minor	0/1		Weak
	None	0/1		Weak
	None	0/1		Weak
Gender equity in aspirations for girls and boys Attitude (1): Card sort gender role scale Attitude (2): The most important aspiration for a girl is to be a mother and take care of her family (disagree) Behavior (1): How often did you talk about your hopes for the future with a parent in the last month? (ever) Behavior (2): How often did you talk about your hopes for the future with a sibling or friend your age in the last month? (ever)	None	2/2	0/1	Strong
	None	1/2		Weak
	Minor	1/2		Weak
	Minor	2/2		Moderate

^a Minor range issues were dichotomous measures with >80% endorsement, major issues were >90% endorsement. Minor missing data was >5%.

^b Measures that were related to at least 2 other VYA constructs within the same domain were considered strong if no range or missing data issues and moderate if any range or missing data issues

4. INTERVENTION IMPLEMENTATION

Save the Children's partner community based organization Sunshine Social Development Organization (SSDO) was responsible for implementing and monitoring the Very Young Adolescent Gender Norms Package. The intervention took place in four VDCs in Kapilvastu. All nine wards in each of the selected VDCs were included in the study. At the beginning of the intervention period, Save the Children trained partner NGO staff on concepts related to gender, power, and inequality during a three-day long interactive training. This essential first step allowed staff to reflect on their own values, biases, and norms to enable them to implement the intervention without biases. The training also included a general overview of the importance of working with early adolescents, the intervention components and how they were designed to increase gender equality. A total of seven NGO staff (four community mobilizers, one project officer, one program coordinator, and one board member) participated in the training.



Figure 7. Participants in the Choices facilitator training

Following the initial partner gender training, 72 Choices facilitators (36 girls and 36 boys) were selected from the child clubs. A total of two facilitators, one girl and one boy, were chosen from each of the 36 child clubs. Selection took place during child club meetings; members recommended facilitators based on the following criteria: age (16 – 18 years old); literate; potential to be a dynamic facilitator based on past child club participation; and leadership skills, such as being an outspoken participant of the child club with the ability to lead child club sessions. Following the selection of the facilitators, the partner NGO conducted a five day training for Choices facilitators to develop facilitation skills, such as the ability to encourage reflection and dialogue among the child club members and understand the content and process of the nine Choices sessions. The training also included time to reflect on gender values, violence against children and woman and the role of men and boys in reducing gender inequality. Choices facilitators were provided the Choices manual as well as the materials needed to conduct the Choices sessions, including brown paper, masking tape, markers, pens, and *Rakchha Bandan* (the traditional bracelet used in the 8th session). Lastly, the facilitators were trained to use the attendance register to monitor participation.

Save the Children also trained the NGO community mobilizers, project officer and program coordinator to implement Voices. The training covered instruction in how to recruit parents to participate, project the videos using the mini LCD projectors, and facilitate dialogue after the video screening. Lastly, Save the Children conducted a two day training for four NGO community mobilizers on how to implement Promises. The objective of the training was to enable participants to: 1) identify influential community members; 2) negotiate with communities to locate the community message boards; 3) follow the

timeline on when to change the posters; 4) inform influential community members of the group sessions and; 5) conduct the group dialogue during the poster unveiling sessions.

4.1. Choices

Choices sessions were conducted in both the control and experimental VDCs in 36 child clubs. Sessions were conducted every Saturday for two hours over a three month period. The Choices intervention was developed to be conducted every two-to-four weeks to allow time for the participants to process and internalize new information and test new behaviors, however a compressed schedule was used due to the many external factors impacting the study's timeline, including the 2015 earthquake and 2016 political strikes, curfews, and fuel shortages. NGO staff monitored the quality of the sessions through observations and on the spot feedback for the facilitators. These same external factors limited Save the Children's ability to monitor activities side-by-side with the local NGO staff who lived closer to the communities.

Choices was implemented in both experimental and control VDCs in 36 child clubs. Local staff from partnering NGOs as well as community members helped to monitor the sessions and provided feedback to the facilitators. According to the participant registers, between half and 70% of the child club participants attended five or more of the nine Choices sessions (Experimental VDCs: Dhanakauli (51%), Jahadi (45%); Control VDCs: Mahuwa (81%) and Niglihawa (71%)). The mean attendance across all VDCs was five out of the nine sessions. However, consistency of participation varied substantially by VDC. Participation was much higher in the control VDCs, where there were no parent or community activities, than in the experimental VDCs. Records show that the mean attendance in Dhanakauli and Jahadi (experimental VDCs) was 4 out of 9 sessions, as compared to a mean of 7 out of 9 sessions in Mahuwa and Niglihawa (control VDCs).

Table 8. No. of Choices Sessions attended by VYAs by Control and Experimental VDCs

# of Sessions Attended	Control VDCs	Experimental VDCs
0	6	54
1	16	46
2	16	65
3	39	77
4	51	70
5	55	77
6	76	59
7	88	60
8	105	54
9	150	39
Total	602	601

4.2. Voices

Voices was implemented in each of the 18 wards in the two experimental VDCs (Jahadi and Dhanakauli). Voices consists of six videos each lasting about ten minutes. The original design of Voices was to hold three sessions with parents, with two videos shown and discussed during each session. Because of the external factor challenges mentioned above which shortened the implementation period, Voices was rolled out with only two sessions with parents per ward with participants watching and discussing three videos during each session. All of these screening sessions were conducted during the same three month period during which Choices was being conducted with their children.

Mobilizing parent participation in the screenings was critical. Parents were first informed of the Voices intervention when they signed consent forms to participate in the study. During the week of the actual video screening, the NGO community mobilizers visited the homes of parents to invite them to the sessions, informing them of the date, time, and location. The invitation to the video sessions was also shared during the Promises group dialogues and through children participating in Choices sessions. Although the intent was to invite only the parents of Choices participants, due to high rates of labor migration among fathers (and some mothers) and the extended household, other family members were invited in place of the parents, such as grandparents, aunts or uncles, or elder sisters. The Voices sessions were facilitated by the trained NGO extension workers using the structured discussion guide in the manual, culminating in a group commitment to test a new behavior to promote gender equality in their own household. The Voices sessions were held at the child club location or the home of a community member. The videos were projected on white sheets by a mini-LCD projector. Most often, the participants sat on the floor on traditional Nepali mats. The sessions could last up to 90 minutes allowing 30 minutes per video and discussion. While the intervention design called for facilitated



Figure 8. Voices session

discussion after each video, in some communities, the group chose to watch all three videos before opening the discussion. Of note, in one ward called Birpur, the school headmaster and teachers added an unplanned activity, showing the Voices videos to students in the school. According to the monitoring data, 86 adults were exposed to the first three videos

during Session 1 and 414 adults were exposed the last three videos during Session 2. Attendance rose during the second session after community members understood the intervention and heard about the interesting videos others were watching. Session 1 consisted of three videos: 1) Evenly dividing household chores; 2) Keeping daughters in school; and 3) Committing to not discuss early marriage. The second session included: 4) Ask boys and girls about their hopes and dreams; 2) Provide equal amounts and equal quality of food of boys and girls; and 5) Equally bring hope to boys and girls.

Table 9. Number of participants in Voices sessions by VDC

	Dhanakauli VDC			Jahadi VDC			
	Father	Mother	Other	Father	Mother	Other	Total
Session 1	2	5	7	19	35	18	86
Session 2	48	92	32	62	113	67	414

A complementary innovation to Voices, not previously tested, was use of Interactive Voice Response (IVR) to support behavior change among parents. IVR is a telephone system which callers can use to hear an automated menu of options and choose which option interests them. It is most often used by private companies to direct customers to the right department based on the purpose of their call. In the social sphere, IVR has been used to disseminate information. For example, community health workers can use IVR to seek additional information after a training, choosing the specific information of interest to them. Short audio clips from the Voices testimonials were put on the system for callers to select a behavior they were interested in, then to further choose whether they wanted to hear a testimonial from a mother, father, or child who has made changes related to that chosen behavior. These recordings were located on a server in Save the Children's Kathmandu office and testimonials could be accessed with a toll-free number. As is often the case with technological innovations, Save the Children faced many challenges bringing this technology to Nepal. The system was finally completed and ready for use after the implementation of Choices, Voices, and Promises began. By the second video screening, the IVR was ready to be advertised. Parents at the video screening were provided the phone number and a demonstration of how to use it on their mobile phone. Parents were encouraged to share the toll-free number with friends and families. The survey data showed, however, that only 14% of the parents (18) had heard of the hotline, and only two women called in.

4.3. Promises

As a first step in implementing Promises, 18 community message boards were installed (one per ward) in the two experimental VDCs Jahadi and Dhanakauli, in order to display the six posters based on the theme of keeping girls in school. The location of the message boards was chosen in discussion with community members and leaders, giving priority to places where most community members gather, the board can be easily seen and the location is safe and accessible for children, girls, and women.

Next, the community and NGO staff selected the community influencers. An extension worker visited each ward and organized a community meeting, asking them to select individuals they viewed as influential and authentic who inspired others to follow them. An influential community member was described as someone they trust, go to for advice, and who is respected by their neighbors for their good character. Influential people did not have to be a religious or community leader (i.e. someone who is influential by virtue of the position they hold), rather, they should be someone others feel comfortable with who are recognized for their ability to share information with others. Many of the nominated community influencers were social workers and teachers, and included men and women from Dalit, Janajati and Madhesi (i.e. disadvantaged) castes and groups. One hundred and eighty community influencers (180) were selected through consultation with community members, ten per ward. After the selection meeting, extension workers visited the selected community members to inform them of their selection and let them know they would be invited to six special discussions at the time of the unveiling of each new poster on the community message board.

Two weeks after Choices began, the first of six Promises posters was installed on the community message board. The NGO extension worker invited the pre-selected influential community members to the poster unveiling and conducted a group dialogue as per the discussion guide in the Promises manual. For the next eight weeks, the subsequent poster was installed accompanied by a group discussion approximately every ten days. Community influencers were encouraged to talk about the posters with their friends and family and encouraged people to go look at the poster. They were not asked to record monitoring data as this intervention depended on word of mouth and the natural diffusion of information through social networks, and literacy was not required of the identified influential community members.

After the presentation of all six posters in each ward, which coincided with the end of the Choices and Voices sessions, a community celebration was organized at the VDC level. All community influencers, community members, parents, government stakeholders, Save the Children and other NGO staff and members of the VDC, District Development Committee (DDC), District Education Office (DEO), District Child Welfare Board (DCWB) participated in the celebration. The total number of participants in both experimental VDCs was 356 (Jahadi 193 and Dhanakauli 163). Children who participated in Choices presented a drama on gender norms during the celebration. At the final meeting, a seventh poster was presented to the community asking individuals for a voluntary commitment to gender norm change. Parents and participants signed the poster signaling their commitment to bring change to their homes and keep their daughters in school.

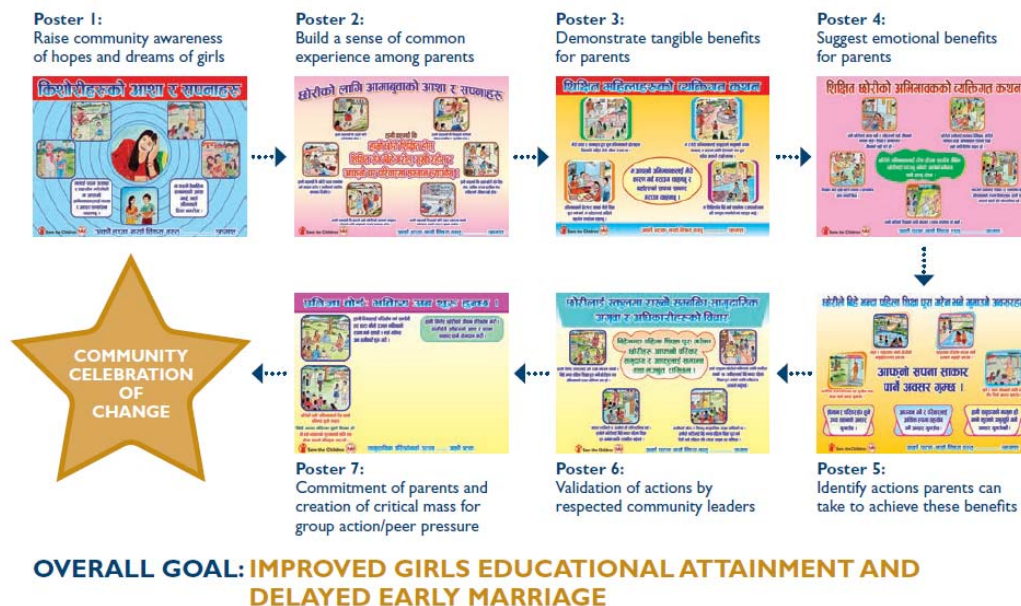


Figure 9. Promises posters

4.4. Implementation Challenges

Several issues arose during the course of this study that influenced implementation of the intervention, and possibly, the study results. First, due to the major earthquakes that occurred in Nepal in April and May 2015, the launch of the intervention was delayed for about six weeks. Additionally, the project inception workshop with the Principal Investigator and technical advisors was cut short, possibly influencing the ability of the project team to implement and monitor the intervention as designed. Furthermore, following the earthquake and the emergency response, changes were made in the Nepali constitution that led to political strife, massive strikes, and unrest in the Terai region where the intervention was taking place. For safety purposes, a curfew was instituted for Save the Children staff. This restricted their ability to monitor and provide technical assistance to the implementing partner, SSDO, which may have led to the lower than expected number of participants in intervention activities. In addition, due to the earthquake and political unrest, the intervention period was collapsed from the planned eight months to only three months. Cultural practices and behaviors within Nepali communities are deeply rooted and gender-related attitudes and norms are difficult to change. Communities are often not ready to make immediate changes; time may be required before changes are observed. This shortened intervention period (three months) may have compromised the effectiveness of the gender norms package which was designed to allow more time between Choices session, Voices videos and Promises posters to foster reflection and behavior change. Finally, although an effort was made to match the VDCs on a number of factors, including ethnicity and religion, there were more wards with primarily Muslim families in the experimental as compared to the control group. Project staff observed that Muslim parents were more reluctant than other parents to allow their girls to leave their homes to

participate in the Choices intervention. Also of note, field staff reported that the wards affected by the strikes were disproportionately located in the experimental VDCs, possibly reducing participation.

5. RESULTS

This section presents the results of the baseline and end line surveys as well as qualitative findings. We begin with a description of the characteristics of the VYAs and parents participating in the study and their levels of participation in the intervention. We then present changes in key indicators from baseline to end line and subsequently share the results of analysis assessing the additive effect of the parent intervention. The presentation of the survey results ends with a discussion of variations of outcome variables by gender and age. The second half of this section presents the analysis of the in-depth interviews with girls and focus group discussions with parents.

5.1. Demographic Characteristics

VYA Characteristics. The demographic characteristics of VYAs in the intervention and control areas were similar to each other at baseline (Table 10). In both areas the samples were evenly split by gender, and VYAs were on average about 12 years old. About 60% of VYAs in each area were 10-12 years old while the remainder was 13-15 years old. Almost all VYAs were unmarried in both the control (98%) and intervention areas (99%) ($p=0.64$).

Table 10. Demographic characteristics of VYAs
(baseline in intervention (n=600) and control (n=600))

Characteristic	Control (n=600)	Intervention (n=600)	p-value
Gender, % (n)			0.87
Male	49.7 (298)	50.3 (302)	
Female	50.3 (302)	49.7 (298)	
Age, mean (SD)	12.0 (1.4)	12.1 (1.4)	0.22
Age Group, % (n)			0.34
10-12	61.8 (371)	59.2 (355)	
13-15	38.2 (229)	40.8 (245)	
Married, % (n)			0.64
No	98.3 (590)	98.7 (592)	
Yes	1.7 (10)	1.3 (8)	

Parent Characteristics. Significant differences, however, were observed at baseline in the demographic characteristics of parents in intervention and control areas (Table 11). Women comprised the majority of parents interviewed at baseline in both areas, though a greater percentage of mothers participated in the survey in the control areas (65%), as

compared to the intervention areas (55%) ($p=0.01$). While on average parents were of a similar age in the control (mean=40, SD=10.1) and intervention areas (mean=39, SD=8.3), the age distribution was wider in the control group, with a greater share of younger and older parents ($p=0.001$). Most parents in both areas were Hindu (control: 93%; intervention: 80%), but parents in the intervention areas were more likely to be Muslim (18%) than in the control areas (6%) ($p<0.001$). Reported occupations also varied somewhat between areas, with more parents working in agriculture in the intervention areas (86%) than in the control areas (67%).

Table 11. Demographic characteristics of parents
(baseline in intervention (n=300) and control (n=300) areas)

Characteristic	Control (n=300)	Intervention (n=300)	<i>p</i> -value
Gender, % (n)			0.01
Male	34.7 (104)	44.7 (134)	
Female	65.3 (196)	55.3 (166)	
Age, mean (SD)	39.8 (10.1)	39.4 (8.3)	0.56
Age Group, % (n)			0.001
<40	54.0 (161)	47.7 (143)	
40-49	28.9 (86)	42.3 (127)	
50+	17.1 (51)	10.0 (30)	
Religion, % (n)			<0.001
Hindu	93.0 (278)	79.7 (239)	
Muslim	6.4 (19)	18.3 (55)	
Other	0.7 (2)	2.0 (6)	
Occupation			<0.001
Agricultural	67.4 (201)	85.7 (257)	
Work in home	24.8 (74)	8.3 (25)	
Commercial or other	7.7 (23)	6.0 (18)	

VDC Characteristics. In an attempt to better understand differences in participation in the intervention by VDC, we analyzed parent characteristics by VDC (Table 12). Parent demographic characteristics did vary across VDCs, although did not consistently fall in the same direction by study arm. In Mahuwa (control) and Jahadi (experimental) the samples were fairly evenly split by gender, while in Dhanakauli (experimental) and Niglihawa (control) the samples were 62% and 77% female respectively. The mean age of parents was similar across VDCs, although the distribution by age group varied across the areas ($p<0.001$). While all VDCs were majority Hindu, the experimental VDC Jahadi had a far greater percentages of Muslim parents (29%) than the other VDCs, Dhanakauli (8%), Mahuwa (8%), and Niglihawa (5%). In all VDCs most parents worked in agriculture, but in

Niglihawa (control) many parents reported working in the home (35%) or in commercial or other occupations (13%).

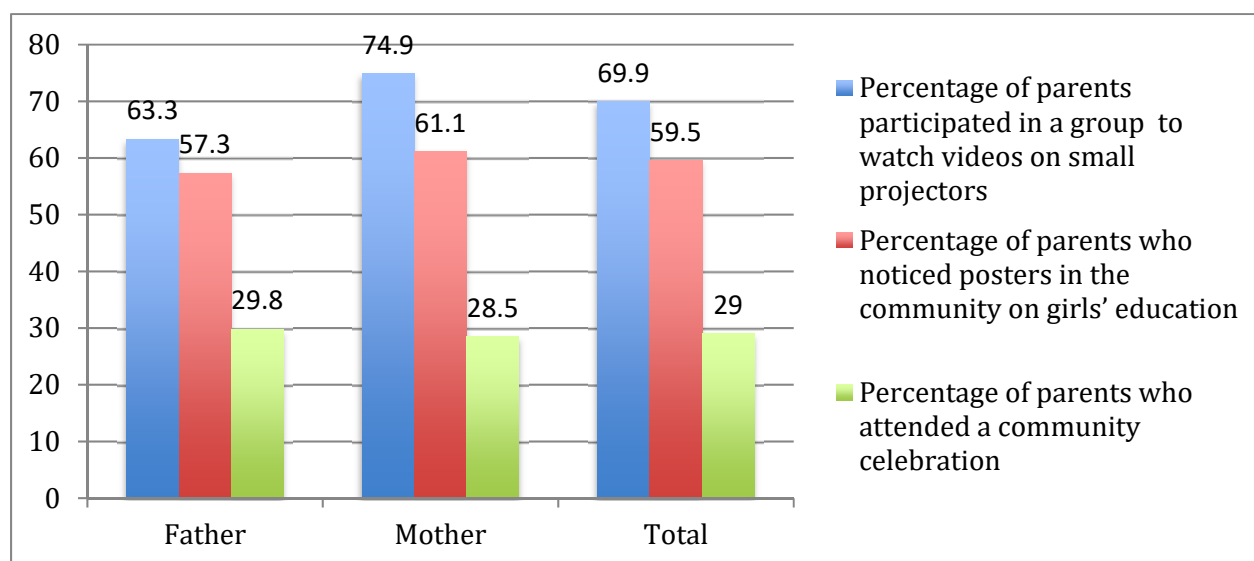
Table 12. Parent demographic characteristics at baseline by VDC

Measure	Control		Experimental		<i>p</i> -value
	Niglihawa (n=149)	Mahuwa (n=151)	Jahadi (n=149)	Dhanakauli (n=151)	
Gender, % (n)					<0.001
Male	23.5 (35)	45.7 (69)	51.0 (76)	38.4 (58)	
Female	76.5 (114)	54.3 (82)	49.0 (73)	61.6 (93)	
Age, mean (SD)	39 (8.4)	41 (11.5)	39 (8.9)	40 (7.7)	0.43
Age group, % (n)					<0.001
<40	54.7 (81)	53.3 (80)	54.4 (81)	41.1 (62)	
40-49	34.5 (51)	23.3 (35)	34.2 (51)	50.3 (76)	
50+	10.8 (16)	23.3 (35)	11.4 (17)	8.6 (13)	
Religion, % (n)					<0.001
Hindu	95.3 (141)	90.7 (137)	69.8 (104)	89.4 (135)	
Muslim	4.7 (7)	8.0 (12)	28.9 (43)	8.0 (12)	
Buddhist/Other	0 (0)	1.3 (2)	1.3 (2)	2.6 (4)	
Occupation, % (n)					<0.001
Agriculture	52.4 (77)	82.1 (124)	91.3 (136)	80.1 (121)	
Work in home	34.7 (51)	15.2 (23)	2.0 (3)	14.6 (22)	
Commercial/Other	12.9 (19)	2.6 (4)	6.7 (10)	5.3 (8)	

5.2. VYA Participation in Choices, Voices, and Promises

All of the children interviewed participated in Choices, as participation was a study inclusion criteria, despite monitoring data revealing unequal exposure between control and experimental groups (see Section 4.1). The frequency or intensity of their participation was not measured in the survey as we were not confident of their ability to accurately report the number of sessions they attended. Thus, all VYAs are considered equally exposed to the intervention, regardless of the number of sessions they attended. Turning to the parents in the intervention arm, seven out of ten (69.9%) reported watching the videos, six out of ten (59.5%) noticed posters on girls education and nearly three out of ten (29%) attended a community celebration (Figure 10). No parents in the control arm reported seeing the videos or posters.

Figure 10. Parental exposure to community awareness on VYA (end line, experimental group)



A higher proportion of mothers than fathers watched the videos (74.9% vs 63.3%) and noticed posters on girls' education (61.1% vs 57.3%). Nevertheless, over half of fathers participated in the intervention, which is a notable achievement for a parenting program using a gender synchronized approach. Fathers and mothers attended community celebrations at similar rates (29.8% vs 28.5%).

5.3. Intervention Effects

To measure intervention effects we conducted two types of analysis: 1) baseline - end line comparisons to assess the effects of VYA participation in Choices; and 2) difference in difference analysis to assess the additive effect of the parent intervention to VYA participation in Choices - our major research question. In order to produce the most valid and reliable results possible given the implementation challenges faced in the post-earthquake environment, we opted only to use moderate and strong quality measures (see tables 6 and 7), substantially reducing the number of dependent variables in our analysis.

5.3.1. Effect of Choices on Parents and VYA (Baseline- end line comparisons)

We first address the question of the effect of participation in Choices, noting the absence of a comparison group to account for potential confounding historical effects. Because the measures were developed and tested with the end line data, we began by assessing the construct validity of each moderate and strong quality measure in the baseline data, to determine whether both baseline and end line data could be used to evaluate the intervention effect on these measures (see Figure S2 in Appendix F). For the two parent measures, both held up in the baseline data. For the VYA measures, three did not hold up at baseline, while the remaining seven were satisfactory.

Parents. Overall, parents' attitudes about delaying girls' marriage were similar at baseline and end line (Table 13). At baseline 87% agreed that marrying girls at an early age is bad for the community while at end line 88% agreed. The age at which parents wanted their daughters to marry did increase overall from 19.4 (SD=2.2) at baseline to 20.0 (SD=2.1). This increase of 0.6 years [95%CI: 0.3-0.9] remained significant after adjusting for the parent intervention, parent gender, and parent age. In order to interpret these results, remembering that half of the parents (experimental group) were exposed to Voices and Promises, and all of the parents could have been influenced by new ideas brought home by their children from the Choices sessions.

Table 13. Effects of Choices on parent attitudes and behavior related to delayed marriage

(Moderate Quality Parent Measures)

Measure	Baseline (n=600)	End line (n=600)	End line vs. Baseline	
			OR / beta [95%CI]	aOR / beta [95%CI]
<i>Delayed marriage for girls</i>				
Attitude: Marrying girls at an early age is bad for the community, % (n) agree	87.0 (517)	88.0 (528)	1.09 [0.77-1.54]	1.10 [0.78-1.56]
Behavior (d): At what age would you like your daughter to marry? mean (SD)	19.4 (2.2)	20.0 (2.1)	0.59 [0.31-0.87]***	0.56 [0.28-0.85]***

^a Adjusted for parent intervention area, parent gender, and parent age.

VYA. According to the study design, all of the children recruited for the survey were to be Choices participants. As discussed in Section 4.1, however, monitoring data revealed that 6 children in the control and 54 in the experimental group did not participate in even one session of Choices. Because this information was not collected in the survey, these children are included in the sample. Overall, most of the moderate and strong quality indicators for VYAs showed that norms, attitudes, and behaviors became more equitable over time, comparing baseline to end line. There were statistically significant increases in five of the seven measures. The increase in the remaining two measures was marginally significant.

Table 14. Effects of Choices on VYA attitudes and behaviors related to education, household chores and resource sharing and aspirations
(Quality VYA Measures)

Measure	Baseline (n=1,200)	End line (n=1,200)	End line vs. Baseline	
			OR / beta [95%CI]	aOR / beta [95%CI] ^a
<i>Gender equitable education</i>				
Attitude: It is more important for a girl to help at home and learn household activities than to spend time studying, % (n) disagree	58.8 (685)	80.6 (965)	2.90 [2.41-3.48]***	3.22 [2.64-3.94]***
Behavior (2): Have you ever told your parents (guardian) that it is important for your sisters/you to continue studying? mean (SD)	78.1 (898)	80.9 (949)	1.19 [0.97-1.45]	1.22 [0.98-1.50]
<i>Gender equitable household chores and resource sharing</i>				
Norm (1): Boys who help with chores are considered weak by their friends, % (n) disagree	51.3 (614)	78.2 (934)	3.41 [2.85-4.08]	3.56 [2.94-4.30]
Norm (2): My parents admire boys who help their sisters with household chores, % (n) agree	88.0 (1,052)	90.3 (1,074)	1.28 [0.99-1.66]	1.31 [1.00-1.73]
Attitude (1): Boys should have more free time than girls, % (n) disagree	45.5 (542)	71.9 (860)	3.06 [2.59-3.63]***	3.44 [2.86-4.13]***
<i>Gender equity in aspirations for girls and boys</i>				
Attitude (1): Card sort gender role scale, mean (SD)	3.7 (2.9)	8.2 (3.1)	4.43 [4.19-4.67]***	4.47 [4.22-4.71]***
Behavior (2): How often did you talk about your hopes for the future with a sibling or friend your age in the last month? % (n) ever	71.9 (858)	84.1 (1,005)	2.07 [1.70-2.53]***	2.12 [1.72-2.62]***

^a Adjusted for parent intervention area, VYA gender, and VYA age.

5.3.2. Benefits of adding parent and community level interventions

Here we address our primary research question – the additional benefits of working at the family and community level while also engaging VYAs in Choices workshops. In this section, we will look at intervention effects comparing baseline and end line differences in

the control (Choices only) and intervention (Choices, Voices, and Promises) areas using moderate and strong measures.

Parents. Table 15 presents results for parent attitudes and behavior related to delayed marriage. These were difficult constructs to measure due to high social desirability, and the indicators were assessed to be of moderate quality. The gender equitable attitude about delaying marriage for girls increased in the control areas from 80% to 88%, but decreased in the intervention area from 94% to 88%, resulting in a significant negative intervention effect ($p=0.001$). The desired age for daughters to marry increased in both the control areas (19.5 to 20.4) and in the intervention areas (19.4 to 19.7), but the increase in the intervention area was significantly less than the increase in the control area, also resulting in a negative intervention effect ($p=0.04$). These intervention effects were relatively unchanged after adjusting for parent gender and age.

Table 15. Effects of intervention on parent attitudes and behavior related to delayed marriage
(Moderate Quality indicators)

Measure	Choices (%)		Choices, Voices, Promises (%)		Intervention Effect ^a	p-value
	Baseline (n=300)	Endline (n=300)	Baseline (n=300)	Endline (n=300)	OR [95%CI]	
<i>Delayed marriage for girls</i>						
Attitude: Marrying girls at an early age is bad for the community, n (%) agree	80.3 (236)	87.7 (263)	93.7 (281)	88.3 (265)	0.29 [0.14-0.61]	0.001
Behavior (d): At what age would you like your daughter to marry? mean (SD)	19.5 (2.6)	20.4 (2.5)	19.4 (1.9)	19.7 (1.7)	-0.60 [-1.17-0.04]	0.04

^a Intervention Effect indicates logistic or linear regression interaction term between endline time period and intervention area. Red shading indicates intervention in the opposite direction as expected. Reported intervention effects are unadjusted.

VYAs. Seven VYA measures were judged to be moderate or strong quality at both baseline and end line, the intervention had a positive effect on four, no effect on two, and a negative effect on one (Table 16). We report unadjusted intervention effects, but effects were similar after adjusting for gender and age.

The increase in VYAs' attitude about gender equitable education was greater in the intervention areas than in the control areas (control 70% to 82%, intervention 48% to 79%; $p<0.001$). The gender equitable education behavior decreased in the control areas (86% to 80%) and increased in the intervention areas (69% to 82%), also resulting in a

significant intervention effect ($p<0.001$). The gender equitable household chores norm, disagreement that boys who help with chores are considered weak by their friends, increased less in the control areas (67% to 80%) than in the intervention areas (36% to 77%) ($p<0.001$). The second norm in this domain, agreement with “my parents admire boys who help their sisters with household chores” also had a positive intervention effect ($p<0.001$), with a decrease in the control areas (94% to 84%) and an increase in the intervention areas (81% to 96%).

Two measures had increases of similar magnitudes in both control and intervention areas and no intervention effect. Disagreement with the conventional attitude that boys should have more free time than girls increased from 59% to 83% in the control areas and increased from 32% to 61% in the intervention areas. The gender equity aspirations behavior, talking about hopes for the future with a sibling or friend in the last month, increased from 81% to 92% in the control areas and increased from 63% to 76% in the intervention areas.

The card sort gender role attitude scale, a measure of gender equitability in aspirations, had a negative intervention effect, increasing in both control and intervention areas, but significantly more in control areas. In the control areas, mean scores increased from 3.8 to 9.1, while in intervention areas mean scores increased from 3.6 to only 7.2.

Table 16. Effects of intervention on VYA attitudes, norms and behavior related to education, household chores and aspirations
(Quality Baseline and Endline VYA Measures)

Measure	Choices (%)		Choices, Voices, Promises (%)		Intervention Effect ^a	p-value
	Baseline (n=600)	Endline (n=601)	Baseline (n=600)	Endline (n=599)	OR [95%CI]	
<i>Gender equitable education</i>						
Attitude: It is more important for a girl to help at home and learn household activities than to spend time studying, n (%) disagree	69.7 (414)	81.8 (491)	47.5 (271)	79.3 (474)	2.15 [1.48-3.13]	<0.001
Behavior (2): Have you ever told your parents (guardian) that it is important for your sisters/you to continue studying? mean (SD)	86.4 (509)	79.5 (473)	69.3 (389)	82.4 (476)	3.39 [2.23-5.13]	<0.001
<i>Gender equitable household chores and resource sharing</i>						

Norm (1): Boys who help with chores are considered weak by their friends, n (%) disagree	66.6 (399)	79.6 (477)	36.0 (215)	76.8 (457)	3.01 [2.09-4.33]	<0.001
Norm (2): My parents admire boys who help their sisters with household chores, n (%) agree	94.5 (566)	84.3 (499)	81.4 (486)	96.3 (575)	19.1 [10.2-35.8]	<0.001
Attitude (1): Boys should have more free time than girls, n (%) disagree	59.3 (351)	82.6 (495)	31.9 (191)	61.1 (365)	1.03 [0.72-1.47]	0.88
Gender equity in aspirations for girls and boys						
Attitude (1): Card sort gender role scale, mean (SD)	3.8 (3.1)	9.1 (2.4)	3.6 (2.6)	7.2 (3.4)	-1.64 [-2.11- -1.17]	<0.001
Behavior (2): How often did you talk about your hopes for the future with a sibling or friend your age in the last month? n (%) ever	80.7 (481)	91.7 (551)	63.0 (377)	76.4 (454)	0.72 [0.47-1.11]	0.14

^a Intervention Effect indicates logistic or linear regression interaction term between end line time period and intervention area. Green shading indicates intervention effect in the expected direction; red shading indicates intervention in the opposite direction as expected. Reported intervention effects are unadjusted.

Intervention effects were assessed using only end line data for the three measures that had poor baseline data quality (Table 17). VYAs' endorsement of the gender equitable education norm was similar in the control (91%) and intervention (93%) areas ($p=0.35$). Agreement with the gender equitable household chores and resource sharing attitude that it is more important for a boy to help at home than to spend time hanging out with friends was greater in the intervention area (95%) than in the control area (89%), indicating a positive intervention effect ($p<0.001$). The behavior about talking to parents about girls' age of marriage, however, was higher in the control areas (69%) than in the intervention areas (58%), indicating a negative intervention effect ($p<0.001$).

Table 17. End line intervention effects on VYA attitudes, norms and behavior related to education, household chores and resource sharing and delayed marriage
(Moderate and Strong VYA Measures that were poor at baseline)

Measure	Choices (n=601) (%)	Choices, Voices, Promises (n=599) (%)	Intervention Effect aOR ^a [95%CI]	p- value
Gender equitable education				
Norm: In families I respect, boys and girls get equal time to do homework, n (%) agree	91.5 (546)	92.8 (555)	1.23 [0.80-1.89]	0.35

Gender equitable household chores and resource sharing Attitude (2): It is more important for a boy to help at home than to spend time hanging out with friends, n (%) agree	88.7 (533)	95.5 (568)	2.73 [1.71-4.34]	<0.001
Delayed marriage for girls				
Behavior: For boys: Have you ever talked to your parents about delaying your sister's marriage? For girls: I have talked to my parents about when I want to get married, n (%) agree	69.4 (410)	58.4 (341)	0.61 [0.47-0.78]	<0.001

^a Adjusted for gender and age group

5.4. Gender and Age Considerations

Programs working to advance gender equity and assess their progress face a complex task, in part due to the intersections between personal characteristics such as gender, age and religion which influence how programs work and influence evaluation efforts. To shed light on these considerations, we assessed variation in the moderate quality parent measures by gender, age, and religion and examined the quality VYA measures by gender. We describe moderate and high quality measures of norms, attitudes, and behaviors by gender, age group, and religious affiliation.

Parents. There were no significant differences among parents by gender or age in agreement with the attitude that marrying girls at an early age is bad for the community (Table 18). While agreement with this attitude was high among both Hindus (89%) and Muslims (81%), there was a statistically significant difference between the two groups ($p=0.04$). There were also no differences by demographic characteristics in the age that parents wanted their daughters to marry.

Table 18. Parent attitudes and behaviors related to delayed marriage by demographic characteristics
(Moderate quality end line measures)

Characteristic	Delayed Marriage for Girls			
	Attitude ^a % (n)	p-value	Behavior ^b mean (SD)	p-value
Gender		0.48		0.29
Fathers (n=227)	86.8 (197)		20 (1.8)	
Mothers (n=373)	88.7 (331)		20 (2.3)	
Age		0.24		0.90
<40 (n=282)	90.1 (254)		20 (2.1)	
40-49 (n=215)	85.1 (183)		20 (2.2)	
50+ (n=103)	88.4 (91)		20 (2.3)	

Religion	0.04	0.65
Hindu (n=525)	89.0 (467)	20 (2.2)
Muslim (n=72)	80.6 (58)	20 (1.6)

^a Agree that marrying girls at an early age is bad for the community

^b At what age would you like your daughter to marry?

VYA. Moderate and high quality VYA measures, however, varied substantially by gender (Table 19). For the gender equitable education norm, attitude, and behavior, boys' responses reflected a more gender equitable situation. Measures were mixed for gender equitable household chores and resource sharing. Boys endorsed more gender equity on the norm and attitude relating to helping their sisters and helping out at home, while girls were more likely to disagree with the conventional norm about boys who help with chores being seen as weak and disagree with the traditional attitude that boys should have more free time. Boys were more likely than girls to have talked to their parents about delaying their sister's marriage than girls were to have talked to their parents about their own desired age of marriage. Girls, however, expressed greater gender equity in the measures relating to aspirations.

Table 19. VYA norms, attitudes and behaviors related to education, household chores and resource sharing, delayed marriage and aspirations by gender
(Moderate and Strong End line Measures)

Measure	Boys (n=596)	Girls (n=604)	p- value
<i>Gender equitable education</i>			
Norm: In families I respect, boys and girls get equal time to do homework, n (%) agree	97.6 (581)	86.7 (520)	<0.00 1
Attitude: It is more important for a girl to help at home and learn household activities than to spend time studying, n (%) disagree	91.6 (545)	69.6 (420)	<0.00 1
Behavior (2): Have you ever told your parents (guardian) that it is important for your sisters/you to continue studying? mean (SD)	87.4 (513)	74.4 (436)	<0.00 1
<i>Gender equitable household chores and resource sharing</i>			
Norm (1): Boys who help with chores are considered weak by their friends, n (%) disagree	63.5 (377)	92.8 (557)	<0.00 1
Norm (2): My parents admire boys who help their sisters with household chores, n (%) agree	98.1 (580)	82.6 (494)	<0.00 1
Attitude (1): Boys should have more free time than girls, n (%) disagree	66.1 (392)	77.6 (468)	<0.00 1
Attitude (2): It is more important for a boy to help at home than to spend time hanging out with friends, n (%) agree	95.6 (570)	88.5 (531)	<0.00 1
<i>Delayed marriage for girls</i>			
Behavior: For boys: Have you ever talked to your parents about delaying your sister's marriage? For girls: I have	75.9 (444)	52.0 (307)	<0.00 1

talked to my parents about when I want to get married, n (%) agree			
Gender equity in aspirations for girls and boys			
Attitude (1): Card sort gender role scale, mean (SD)	7.7 (3.5)	8.6 (2.5)	<0.001
Behavior (2): How often did you talk about your hopes for the future with a sibling or friend your age in the last month? n (%) ever	81.4 (483)	86.7 (522)	0.01

Despite expectations, most measures did not vary by VYA age (Table 20), comparing those 10-12 years old to those 13-15 years old. The one measure that increased with age was disagreement with the conventional norm that boys who help with chores are considered weak by their friends (74% vs. 81%, $p=0.006$).

Table 20. VYA norms, attitudes and behaviors related to education, household chores and resource sharing, delayed marriage and aspirations by age group
(Moderate and Strong end line Measures)

Measure	10-12 (n=435)	13-15 (n=754)	p-value
Gender equitable education			
Norm: In families I respect, boys and girls get equal time to do homework, n (%) agree	91.0 (396)	92.7 (694)	0.32
Attitude: It is more important for a girl to help at home and learn household activities than to spend time studying, n (%) disagree	81.3 (352)	80.0 (603)	0.58
Behavior (2): Have you ever told your parents (guardian) that it is important for your sisters/you to continue studying? mean (SD)	83.3 (355)	79.4 (584)	0.10
Gender equitable household chores and resource sharing			
Norm (1): Boys who help with chores are considered weak by their friends, n (%) disagree	74.1 (321)	80.9 (607)	0.006
Norm (2): My parents admire boys who help their sisters with household chores, n (%) agree	91.4 (394)	89.6 (669)	0.30
Attitude (1): Boys should have more free time than girls, n (%) disagree	73.3 (318)	71.8 (539)	0.58
Attitude (2): It is more important for a boy to help at home than to spend time hanging out with friends, n (%) agree	91.7 (398)	92.1 (692)	0.79
Delayed marriage for girls			
Behavior: For boys: Have you ever talked to your parents about delaying your sister's marriage? For girls: I have talked to my parents about when I want to get married, n (%) agree	64.6 (277)	63.4 (466)	0.69
Gender equity in aspirations for girls and boys			
Attitude (1): Card sort gender role scale, mean (SD)	8.3 (3.0)	8.1 (3.1)	0.32

Behavior (2): How often did you talk about your hopes for the future with a sibling or friend your age in the last month? n (%) ever	84.3 (364)	84.1 (633)	0.93
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5.5. Qualitative

5.5.1. Very Young Adolescents

In-depth interviews were conducted with 15 girls from the control and 14 girls from the experimental VDCs. Nearly all were enrolled in school at the time of the interview and most had a sibling who also attended the Choices sessions. All of the girls had participated in Choices, so the only expected differences between the two groups would be the added effect of their parents and others in their community participating in Voices and Promises. These results reinforce earlier research showing a positive effect of Choices participation, and some differences in the tenor and detail of the conversations with girls in the control and experimental groups suggest that engaging parents and the community more broadly supports the change process fostered by Choices. Analysis of the interview transcripts reveals that girls recognize and are able to articulate the gender inequities in their lives. However, they also suggest that expectations for male and female roles are becoming more equitable in Kapilvastu, especially in the areas of education and timing of marriage. The extent to which behavior is actually changing, however, is less clear.

Gendered roles and responsibilities. All of the study participants described the lives of girls as more difficult than the lives of their brothers. Girls do more housework and boys have more time to play and study. Despite these clear inequities, girls expressed empathy and solidarity towards their brothers. The girls were asked to respond to a scenario in which a brother and sister (Bibek and Amita) arrived home to find there was a lot of household work to do, even though they had an important test the next day. The girls suggested that Bibek felt guilty that his sister worked more than he did. One girl explained, *“He likes to study and play with his sister. He doesn’t fight, he fetches water while sister is cleaning the dishes, and he studies with his sister.”* Most of the girls stated that Amita and Bibek would work together to finish the household chores and then study together, explaining that this is the way it would be handled in most homes in their village.

The girls in the control group tended to imagine more strictly gendered roles for Amita and Bibek. They described Bibek as having more freedom to decide how to spend his time, *“Sometimes he goes for a walk after school and sometimes he helps with the chores,”* remarked a girl from a control VDC. *“They did not give the same choices to Amita,”* she further clarified. The girls described Amita as confined to home concentrating on her chores and studies. She has less free time and is not encouraged to play outside, unless accompanied by her brother. A girl from the control VDC remarked, *“After returning from school, she washes utensils and does homework.”* Participants from the experimental group did not paint such distinct differences in the way that Amita and Bibek spent their time. Girls from the experimental VDCs were more likely to perceive gender equitable behavior in the home as a household norm, while girls from the control group viewed the gender equitable

behaviors in their homes as unique in their community. *"It is the same. Everyone, brother and sister, work together and go to school together",* remarked a girl from an experimental VDC. A girl from a control VDC said, *"It is different [in my family]. In other families the sister does most of work and brother goes out for a walk. He doesn't help his sister with the housework."*

When asked about their personal experience, as opposed to the experience of Amita and Bibek, both control and experimental respondents described sharing household chores with their brothers. Girls from both study groups believed that boys and girls should have equal access to education and responsibilities for household chores. As a girl from the control group stated, *"I believe there is no difference between boys and girls. They are equal."* Some girls from the experimental group, however, did admit that there are different expectations for boys and girls in their family, remarking, *"Yes, I am expected to spend my time differently than my brother";* and *"My brother goes for outings and I wish I could do that."*

Relationship with brother. Brothers may be natural allies for girls as they seek to fulfill their aspirations. Most of the girls described strong bonds with their brothers and relied upon them for support. They told stories of their brothers sharing chores and advocating for their sisters to stay in school and delay marriage. Nearly every respondent described Bibek as a brother who would comfort his sister if she was being teased. According to the girls, Bibek would tell the perpetrator to stop teasing and reprimand him. *"I would talk to my brother, he would then scold them. My brother is always there with me so nobody teases me",* remarked one girl. Brothers are seen as protectors who support and defend their sisters. However, a few of the girls did say that Bibek would scold his sister for wearing boys' clothes and for behaving like a boy. In general, the girls viewed brothers as more supportive than their parents in situations of teasing. Some of the girls said that parents would tell Bibek's sister, Amita, to behave properly and dress and act like a girl. Girls from the experimental VDCs were more likely than those from the control areas to describe a scenario in which the parents would find the boy who was teasing their daughter and scold him.

Parents. In general, girls described their parents as supportive and desiring of a more equitable future for their daughters. According to them, their parents value cooperation, equity, and harmony in their home. Many respondents stated that parents support and validate the changes their children are making and feel happy about them. The girls said that their parents would feel proud to see their children working together. *"Look at our children they work and study together seeing this even the neighbors are happy. Therefore they feel good",* said a girl in the experimental group. Some girls however, said that although parents may feel badly that their daughters must work more than their sons, but feel constrained by community norms to ask their sons to help their sisters. They went on to say that if the boys themselves decide to help their sisters with household chores, it relieves parents of that responsibility. The girls believe their parents will find their household more harmonious, with less tension, fighting, and resentment between siblings if work is shared more equally.

Community influence. In the vignette described above, the girls were asked to comment on what would happen if their aunt arrived at their home and saw the brother and sister sharing kitchen chores. All of the girls responded that their aunt would support this scenario. *"She will say, wow, such a good boy, he is helping his mother in the kitchen and giving his sister time to study,"* said a girl in the experimental group. Another girl, also from the experimental group commented, *"Their aunt says that they work together and afterwards study together. Aunt's children don't work and study together so she feels good looking at her brother-in-law's children. She feels that it would be better if her children would have done like Amita and Bibek."* Only a few respondents (from the control group) described the fictional aunt as unsupportive or critical. For example, a respondent from the control area described the aunt's reaction this way, *"You are giving girls time to study and work for boys? Don't do that. Boys are valuable in our society. Thus, girl needs to work and boy needs to study."* The girls in the experimental group were asked if Amita and Bibek's parents would hold a different opinion if they had not participated in Voices and Promises. The girls responded that parents who had not participated in the intervention would follow traditional gendered role assignments, *"They would make Amita do more work, they would not have allowed Bibek to do household chores. Instead they would have motivated him to study only. Only Bibek would have gotten time to study."*

Changing marriage norms. To trigger discussion, the interviewer told the girls a story in which 14 year old Amita and her brother overhear their parents discussing her impending marriage. All of the girls said that Amita would feel sad because she would not be able to continue going to school and would likely be mistreated in her husband's home. The girls described Amita as feeling tense, angry, frightened, and crying when she overheard her parents talking about her marriage. The girls participating in the study did not associate the prospect of marriage with joy and happiness, but with fear and sadness and a loss of self-growth and opportunity.

Figure 11. Marriage quotes

"She will feel bad because she thinks she is too young to marry and she hasn't completed her studies." - Experimental

"I feel like crying. Because after marriage I will not be able to study. I have to wash utensils and do household chores. My life will be spoiled. It will be a problem if I get pregnant too soon. I will not marry until I have completed grade 12 and have a job." - Control

Interestingly, the comments of the girls in both groups highlight the potential role of brothers in their sisters' lives. The girls imagined Bibek expressing compassion and empathy for Amita. A girl in the experimental group put it this way, *"He will feel sad if they marry his sister so early. She will go to her house and her life will be spoiled. If she finishes her studies before marriage then her life will be secure."* However, only a couple of the girls mentioned that Bibek would speak to his parents on his sister's behalf, such as this girl from the control group, *"He tries to convince his mother for not doing early marriage. He feels bad, tense, worried. He will feel lonely at home and also he will have to do all the work*

alone.” When the girls in the experimental group were asked to comment on what Amita’s parents would do if they had not participated in the Voices video sessions, one girl replied, “They would have married Amita at the young age. They would not understand their daughter’s hopes and dreams, they would not hear about them.”

The girls said that situations like this are common in their homes, although their mothers, in particular, feel sad about marrying their daughters at an early age. However, the girls did comment that recent examples of girls who completed their education and went on to do well are influencing community attitudes. *“Recently the trend is changing; people are more concerned about educating girls. In our village there are two girls who got education and one of them became teacher and other is studying staff nurse”,* said one girl in a control VDC.

When asked about their own experiences with marriage, most girls stated that marriage takes place around the age of 16 or 17. In Kapilvastu there are two marriage ceremonies, the actual marriage is typically performed at a younger age and then *Gauna* takes place three or four years later. It is at the time of *Gauna* that a girl typically leaves her home to live with her new husband’s family. Girls often continue attending school after the marriage ceremony, but typically leave school once the *Gauna* happens. Most respondents preferred that marriage and *Gauna* take place at the same time, around the age of 20. Participants’ stories of their own and their sisters’ experiences varied. However, most parents seem to be delaying their daughter’s marriage, or at least the final *Gauna* ceremony. A few girls told of situations in which they were able to negotiate directly with their parents to delay their marriage. In one instance, a respondent from the control area explained, *“My parents talked about my marriage at age 12 or 13. I am now 14 years. I will not marry now, I will marry after completion of my education and reach my goals, and then I will marry. Parents said okay.”*

Aspirations. The final vignette discussed in the interview was a story about a mother and daughter discussing the hopes and dreams for the future of the Amita and Bibek. This vignette was designed to explore gender equitable aspirations. The main difference in aspirations noted in both groups was that Amita could be a teacher while Bibek might be a doctor or an engineer. The girls told stories in which mothers held higher expectations for their sons than their daughters. However, the girls did recognize that Amita and other girls now have better opportunities and increased access to education than their mothers’ generation. When asked how Amita’s mother might talk about the opportunities available to her when she was young, a girl from the control group painted a clear picture of increased opportunities for girls today:

“Maybe different. I was not able to study when I was young, but they can study. Amita’s mother will not force her children to marry at young age, rather she will let them be a teacher or an engineer when she grows up. Girls can become police and serve the country, do social work, become teacher and exchange knowledge with students. Her mother says, ‘It will be better.’”

According to the girls, Amita’s mother might predict that Bibek would buy a bike and build a new house once he is successful, while Amita earns from her job and improves the

community through teaching, but still must live at her husband's house. Amita's mother is described as investing in her children, allowing them to study and not pushing them to get married early.

When asked about their own experiences on this topic, contrary to expectations, girls from the control area were more likely to share their future dreams with their parents than girls from the experimental area. Most talked about sharing their dreams with their mothers in particular, not both parents. Girls from the experimental group were more likely to respond that they had not had the right opportunity to discuss their dreams with their families. Those who did share their dreams with their parents mentioned that this happened only after participating in Choices. *"After joining Choices class, I have gained confidence and started thinking that I can go forward. And shared my dreams with my parents,"* commented a girl from the control group.

Figure 12. Reflection on Choices

"I learned a lot from Choices and became able to say many things." - Experimental

"Before I couldn't express myself, but after participating in Choices I can talk openly without any fear." - Control

"After participating in Choices program I am able to talk about my hopes and dreams." - Control

Influence of Choices, Voices, and Promises. Respondents from both control and experimental VDCs described significant changes as a result of participating in Choices, although it is difficult to assess from the qualitative data whether there were additional benefits in the lives of the girls in the experimental VDCs where parents are engaged. Overall, girls in both groups described their parents as supportive, allowing them to continue their education, focus on their studies and spend time away from household chores studying. The girls also said that their parents encourage their brothers to participate in household chores.

The major outcome of the intervention cited by the girls was less conflict and more harmony at home. The girls from the experimental VDCs reported less scolding and more nurturing behaviors by their parents after they participated in Voices. One girl from the experimental group shared, *"My parents think sons and daughters are equal. There is no discrimination between us. Work is equally divided between us. After watching the videos they learnt lots of things."* Another stated, *"They support me a lot. When I come home from school they tell me to sit and study before I work. Only then will I get ahead in life."* Interestingly, two respondents from the control area stated that there was less domestic violence after participating in Choices. These families did not participate in the Voices sessions, but it raises the question of whether children who model more gender equitable behavior are able to influence others close to them. For example, some girls mentioned that their fathers

seem to be providing more support to their wives after observing their sons doing more work around the home.

While it is not possible to measure the effect of Choices, or the additive effect of Voices and Promises from these qualitative results, they do suggest that children see the value of the interventions and feel that their lives are changing positively as a result of their participation. They also provide insight into the ways that girls view their lives, and factors which could motivate change. These interventions were designed to tap into emotions that motivate change, and finding that girls view their parents and brothers as caring and supportive of their dream validates the principles underlying the intervention design. These results also suggest that an important factor motivating change might be the desire for harmony in the home, and that some behaviors are determined by the siblings themselves rather than the parents. Brothers have the potential to advocate for their sisters both within and outside of the home. These results also indicate that community norms regarding the appropriate roles of girls and boys are shifting, with greater value placed on girls' education, partly due to practical economic considerations. Finally, these findings raise the question of the power of children to set an example and support change, not only among their siblings and peers, but also influence the adults in their lives.

5.5.2. Parents

Focus groups were conducted with parents in the control and intervention VDCs to gather their opinions on Choices, Voices, and Promises and to uncover their perspectives related to gender equity. It is not possible to attribute the changes parents described to these interventions alone, as many other factors influence gender norms and behaviors. Nevertheless, these results do provide insight into the points of view of parents regarding trends towards gender equity in their family and their worries and hopes for their children. Of note is the fact that parents say that they are learning new ideas and behaviors from their children, a promising finding that suggests that children can spread new ideas to their families and communities. In the words of one father, *"My daughter teaches me lots of good things. She has taught me that a girl should get married only after reaching 18-19 years."*

Their remarks reflect the fact that mothers and fathers are learning to parent in a world with moving goalposts. Roles, expectations, laws, and economic realities are changing. One father explained, *"My wife has never been to school. My elder daughter says her sister should not get married until she is 21. I like her thinking a lot. When she said this to her mother, she was bit hurt but I told my wife that society has changed and there has been lots of positive changes. Our daughter is saying a good thing."* Despite the fact that many of the parents expressed support for less traditional, more gender equitable roles and responsibilities in their family, they worry a good deal about the opinion of others. Many shared comments like this mother, *"If any family has an unmarried daughter aged 25, people really say bad things behind their backs."*

Parent concerns. Parents had a number of concerns about their children on their mind. Mothers in particular prioritize maintaining harmony in the home and meeting the daily needs of their family. Parents want to keep peace in the home - brothers and sisters should

get along and share chores. Mothers work to keep their family afloat, sometimes coping with their husband's drinking and violent behavior. In addition, parents worry about their own future. *"My daughter has asked me to invest the same money in her education as I spend on my son's education. If I do that than she will look after me in the future"*, said one mother. It is worth noting that this is the exact message of the one of the Voices posters. Parents expressed empathy for their children, especially their daughters, recognizing that they work harder than their brothers. Mothers in particular recognize the difficulties their daughters face, *"She may not like the system of our society where boys are given priority for education. Girls are supposed to do household chores, washing clothes, cleaning utensils. All the household work is assigned to her, which makes her sad."* Some fathers remarked that they give their daughters more time to study so that they can earn a living, explaining that it is important to invest in their daughters because unlike their sons, they will not inherit from their family. On the other hand, some parents viewed their sons critically because of their sense of entitlement. In a response to a vignette, one mother said of the protagonist, *"He becomes sad if he doesn't get money when he asks for it. If his demands are not fulfilled, if he couldn't go to visit his relatives and also if he couldn't eat food he becomes sad. He also becomes sad if he couldn't go to study. He becomes sad if he couldn't get his rights that he had learned at children's club like: his rights to play and eat and good environment."* In reference to boys, another mother commented, *"Nobody should interfere with what they do...If anything goes wrong they become disheartened."* Parents did not make similar comments about their daughters feeling entitled.

A major stress for parents is providing sufficient dowry and finding a suitable groom and family which will accept and care for their daughter. According to one mother, *"In our culture we need to give more dowry at our daughter's marriage. The more we give the more respect she will get from their house. These things make us worried."* A father explained, *"He is sad (to have a daughter) because of the dowry system. This system creates difficulty for girls. In her husband's house, she gets tortured about what she brought in marriage from her father's house. She has to listen that throughout her life. Sometimes she is forced to commit suicide."*

Division of household chores. Mothers reported that their daughters do more household work than their sons, but parents in all of the focus groups observed that their sons were doing a greater share of work as a result of participating in Choices. A mother explained, *"After finishing their homework sons used to go outside and play but girls did not have any choice except helping their mother in household activities or learning things that would help them in their future, like knitting."* Another said, *"The daughter has to work more than the son. Let's say the son does only 65% of work that the daughter does, because the sister serves food to her brother. The brother doesn't serve the food."*

Changing marriage norms. The remarks of parents during the focus groups showed that social norms are changing and that the expected age of marriage is increasing. In fact, it is now more common for children to be married at an older age and the community may not begin to judge the family until the daughter is older, perhaps 25. Parents also believe that today educated girls are more valued than previously. In fact, a lower dowry may be expected for an educated girl, indicating that society is beginning to recognize the value an

educated woman brings to the household. Parents are aware of the benefits of delaying marriage and all groups reached consensus that they would not marry their daughters before the age of 18 to 20. Parents want their daughters to be well-educated to improve their marriage prospects and reduce the amount of dowry expected. One mother commented, *"If we give a good education to our girls then we don't need to give more dowry in her marriage."* Another said, *"If she studies well she will get a good and respected family."* However mothers also expressed concern that their daughters be skilled in cooking and household chores so that they can fulfill their responsibilities once they are married. Fathers suggested that men place a higher priority on education for their daughters than women, possibly because their wives did not have the opportunity to study. Fathers also reflected that mothers who themselves are educated are more inclined to delay marriage of their daughters, *"If both of them were educated they will think about education. If the mother is uneducated she will insist on marriage. But father's decision on not marrying will be final."*

Aspirations for their children. Parents in all the focus groups commented that their children had shared their dreams with them, and that the parents sometimes initiated these discussions. However, parents from the experimental VDCs provided more details and seemed to have been more supportive of these conversations. One father explained, *"I have consulted with my sons. I have also consulted with my daughter. She said she wants to study"*. All groups described their daughters' futures in a positive way focusing on completing their studies, getting a job, and marrying into a reputable family. Parents hoped their daughters would become teachers and doctors, while they envisioned their sons becoming doctors, engineers, or businessmen. One father commented, *"My daughter says she wants to be a big person after completing her education. She gives the example of educated girls in our village. My son says that someone from our village has become a teacher after completing their education, He also wishes to be a teacher."* Fathers expressed concern in response to a story about a boy, Bibek, who wanted to marry at a young age. A father in the experimental group said, *"If I (Bibek) marry at the young age, I will be punished by law; both husband and wife could be unhealthy. My parents are providing us education, we will study. I will marry after reaching eligible age to marry and then if my parents want me to continue my studies after marriage, I will study. As a result I will be free of social punishment."*

Influence of Choices, Voices, and Promises. Feedback on Voices and Promises was positive and parents reported learning from their participation. In some groups the parents remembered receiving the call-in number, but others didn't recall hearing about it. No one reported actually using the call-in number. Key messages from the interventions were identified by the parents – educating girls, delaying marriage, and treating sons and daughters equally, including providing them equal food. Parents in the experimental VDCs expressed knowledge of the law and the consequences of marrying their daughters before the legal age. Fathers mentioned the legal consequences more often than mothers. Through Voices and Promises, respondents were educated about the benefits of delaying marriage as well as the legal consequences of early marriage.

Figure 13. Parent's reflection on Voices and Promises

"I remember more about the poster than the video. I don't remember much about the video." –Father Experimental

"I watched the videos but my daughter says she won't marry at a young age. She will study. I also think I will let her study more. I was able to learn things I hadn't known." – Father Experimental

"It's all because of the video that we have changed our thinking." – Mother Experimental

Parents in all of the groups reported that they observed changes in their children as a result of participating in Choices. They reported that their sons are now more helpful, daughters are gaining more confidence and all are learning the value of treating sons and daughters equally. A father stated, *"There has been change. First, the children participated in the training. Then they joined children's club. Now she is able to attend the meeting alone and she does go. But before we had to drop her. My daughter also comes and goes alone."* Mothers described that their sons are helping more with household chores and are more supportive of their sisters. According to one mother, *"Before only daughters had to do all the household activities but nowadays both son and daughter get involved and help each other."* Parents in the experimental VDCs spoke more frequently than parents in the control group about their sons helping with household chores on their own initiative, and attributed this change to their participation in Choices. *"Boys even work hard and do labor to make money because now they have understood our poverty. They have even started to prepare their bedding themselves at night"*, remarked one mother.

Girls are advocating for themselves and their parents are listening. Parents say that as a result of Choices, Voices, and Promises, they are learning the value of treating their sons and daughters equally. Parents are learning from their daughters about the value of education and delaying marriage. Girls are advocating for themselves and parents are accepting their request to continue studying and delay marriage. According to one father, *"Things have changed a lot. My daughter says not to marry her at the young age. She says she will study a lot and marry only after completing her higher education. We started believing both son and daughter are equal."* Another father remarked, *"After joining the children's club, my daughter has expressed the wish to study more. She tells us not to marry her at very young age. She wants to study at least till the age of 18 and I will let them study."* Led by their children, supported by the messages in the videos, posters, and group discussions, parents advocate for their daughters. According to a father, *"My daughter is studying in Grade 9, she fell in love with a boy and was trying to go with him. I told them to complete their education with good grades. I talked to the boy as well, I told him if he studies well, when they grow up we will celebrate their marriage ceremony and made him trust me. Both of them are studying now. They attended 10th Grade examination."*

6. DISCUSSION

In this discussion, we address three areas: 1) the benefits of adding family and community level interventions to gender transformative interventions for VYAs; 2) lessons learned regarding measurement; and 3) implications for VYA programming.

6.1. Does working with the family and community bring an additional benefit to VYA interventions?

Little improvement was observed in the parent-reported measures, although it is difficult to make conclusions because of the few quality measures available for analysis. The two parent measures of moderate quality, both in the domain of delaying marriage for girls, did not exhibit a positive parent intervention effect. However, we saw more promising results in our assessment of the parent intervention effect on VYA reports of gender measures. In fact, the majority of the moderate/high quality parent measures had a positive intervention effect, in that the improvement in the measure from baseline to end line was greater in the intervention areas than in the control areas. These positive intervention effects were concentrated among measures in the gender equitable education and gender equitable household chores and resource sharing domains. On the other hand, there was less evidence of intervention effect in the domains for delaying marriage for girls and gender equity in aspirations. The finding that more changes were observed among the children than the adults, poses an interesting area for reflection. It may be that parents influence their children, although they do not change themselves, or it may simply be a measurement artifact. Baseline end line comparisons for the entire sample (assessing the effect of Choices only) found positive effects on gender equitable norms, attitudes, and behavior. However, lack of a counterfactual group that did not receive Choices limits the interpretation of these results, as gender equityability may have increased for other reasons.

While the results suggest that the additional parent and community interventions did have meaningful and significant positive effects, they were not as strong as intended. There are many possible reasons for this, including the possibility that they were not efficacious. However, the results of earlier evaluations of these interventions, combined with the qualitative findings which suggested that VYAs and parents found the parent and community interventions transformative, lead us to consider other possibilities, namely whether the intervention was strong enough as implemented and whether effects were adequately measured. Considering first the intervention strength, the gender norms package was not implemented with fidelity to the model. In order to roll out intervention activities in a context of delay and civil unrest, Save the Children staff in Kapilvastu made the decision to compress the intervention from eight to three months. Thus, rather than meeting three times, viewing two videos at each session over a six month period, parents attended only two meetings, each featuring three videos. Reduced time for reflection and trialing behavior could have an effect on behavior change. In addition, participation of children and parents varied greatly by VDC and was less than optimal. For example, VYA participation in Choices was higher and more consistent in control areas, as compared to intervention areas. Furthermore, many children only attended one session of Choices, while attendance was not a problem during the pilot. Similarly, parent participation in the

first meeting was very low- where three key videos were shown on equally dividing household tasks, keeping girls in school and delaying marriage, although it picked up substantially for the second meeting – where less important behavior changes were targeted, such as equally encouraging hopes and dreams and asking child about their hopes and dreams. Taking these factors into account, it is remarkable that almost 70% of parents reported attending at least one session and that significant intervention effects were observed.

Turning to measurement challenges, substantial differences by VDC suggest poorly matched control and experimental areas. Analysis of results by VDC (not included in this report) show substantial variations, suggesting possible differences in the characteristics of the populations, civil unrest, or quality of the intervention or data collection. However, these differences are difficult to interpret as they do not consistently advantage control or intervention areas, and differences in religion do not significantly influence outcomes. Thus, an initial theory that the intervention was less successful in communities with more Muslim families seems unlikely.

Furthermore, as we analyzed the qualitative and quantitative results, we became increasingly aware of the complexity of the research question. It is likely that the effect of a holistic multi-level intervention cannot be definitively assessed by a multi-arm design. According to the qualitative data, VYAs, parents and community members engaged at all levels of the intervention, reporting synergies resulting in increased discussion, reflection, and trying out new behaviors. For example, parents in the control area reported that they were significantly influenced by their children who shared new ideas with them and advocated for themselves and their siblings to continue their education. Indeed, the question of the importance of parent and community influence on gender equity is unclear and likely varies by specific indicator. For example, according to the results of the focus group discussions, in some domains, such as sharing chores, siblings have the power to adopt more gender equitable behaviors without the support of their parents, as long as there is harmony in the home and the chores get done.

Study Limitations. It is also important to consider study limitations. A stronger study design would have included a separate control area with none of the three interventions and perhaps split out the Voices and Promises interventions into two arms, however that was not possible with the available resources. In addition, few measures turned out to be valid and reliable, so the scope of measures used in the assessment is limited, although those used were of moderate to high quality. Also of concern is that if monitoring data is correct, 60 children who did not participate in Choices were included in the sample (6 in the control group and 54 in the experimental). Because we assumed all study participants would go on to participate in the Choices sessions, information on participation was not collected in the survey and there is no way to eliminate these children from the data set. Furthermore, there were some inconsistencies in the data which suggest issues with data quality at baseline, possibly due to less than optimal quality control measures in one VDC. We addressed the problem by only using measures that worked well at baseline and end line. Other measurement issues are related to the high degree of endorsement on many of the outcome measures, possibly indicating that Save the Children and their local partner

were working in an area which already had high gender equality, or perhaps reflecting courtesy bias. We were advised, for example, before we began the study that few respondents would report marriage before the legal age of marriage (20), so attempted to develop indirect ways of assessing attitudes and behaviors, for example through vignettes.

6.2. What did we learn about evaluating gender transformative interventions for VYAs?

Scale Development and Quality. Few of the potential scales that we tested resulted in moderate or high quality measures. While several groups of items had poor internal consistency and showed little promise for further development, a number of scales had good internal consistency but lack sufficient range. Several of the domains mentioned in Figure 4 may benefit from further testing with additional items or with additional response options. For example, many of the scale items had only two response options: “agree” or “disagree.” Responses were structured this way because pilot testing found that respondents had difficulty responding to additional response options. However, because the vast majority of participants endorsed gender equitable responses, this resulted in a narrow range of scores. Introducing additional response options, such as “strongly agree” and “strongly disagree” for adults or use of images representing additional options may address this issue. Face validity testing on more complex response option would be required to ensure that questions were appropriate for VYA participants.

Many of the single item measures that we tested also had limited range, with more than 80% of participants endorsing the more gender-equitable response. These measures may also benefit from additional response options. Additional context-specific qualitative research may also be important for identifying conventional gender norms, attitudes, and behaviors that are most prevalent in the community.

Our evaluation of construct validity, associations between measures that are theoretically related, indicated that some of the measures held up well in our datasets. It is important to note that we were more successful in developing high quality VYA measures than in developing parent measures. VYA are a population that has been less researched than adults, and many measures that have been used with adults have not been validated with this population. Parents of VYA, however, provide a critical perspective about their children and efforts can and should be made to improve the quality of these data.

Linked analysis of parent and VYA data can provide a wealth of information about gender socialization processes, particularly when collected and linked longitudinally. In this study, only half as many parents were interviewed as the number of VYAs interviewed, and the parents that were interviewed at baseline were not necessarily the same ones that were interviewed at end line. Furthermore, only about 70% of parents were successfully linked to their interviewed children, resulting in small sample sizes for analysis. Additional approaches for linking and tracking VYAs and parents over time have the potential for unlocking a wealth of information about gender socialization processes beyond what can be learned through unlinked cross-sectional datasets

Promising measures. The scope of moderate and high quality measures for VYAs spanned four of the five domains of gender socialization addressed by this study (gender equitable education, delayed marriage, gender equitable aspirations and gender equitable division of chores). Analysis did not yield an adequate measure for the fifth domain, supportive and loving relationships. This domain captured constructs related to violence and was challenging to measure among this age group. While most of these measures consisted of single items, the card sort gender role scale measuring attitudes about gender equity in aspirations was particularly promising. This eleven-item scale exhibited good psychometric properties for VYAs in our study, corroborating prior findings from the Choices evaluation that validated the instrument in a similar population (Lundgren et al., 2013). In comparison to other attempted scales in our survey that used more traditional question modalities, the card sort format may have worked better for this young age group. This scale has promise for use in other VYA populations, and researchers may consider adapting other scales to the card sort format for use with VYAs.

Quality single item measures in the four domains spanned norms, attitudes, and behaviors. We identified four such measures around household chores and free time, three measures about gender equitable education, and one single item measure each about delaying marriage and gender equitable aspirations. Endorsement of many of these single items was high in our sample, stressing the importance of pilot testing and understanding local contexts before relying on single item measures in other settings that may be more or less traditional than our study setting.

For parents of VYAs we identified only two single item measures of moderate quality, both within the domain of delaying marriage for girls. The moderate quality single item on attitudes about delaying marriage for girls measured agreement that marrying girls at an early age is bad for the community. The corresponding moderate quality behavior measure that we identified was parents' indication of the age at which they would like their daughters to marry. The utility of these measures, particularly the attitudinal measure, will depend on the extent to which early marriage is accepted in a given context, as universal endorsement will result in poor discrimination.

Gender Measures by Participant Characteristics. We found that parent measures did not vary greatly by gender, age, and religion. Our analysis of parent data, however, is limited because only two measures were of moderate or high quality. VYA measures, on the other hand, varied by gender but largely were similar across age groups. Each of the moderate or high quality measures differed significantly by gender, but not in a consistent direction. This variation underscores the theory that girls and boys experience different gender socialization processes, and may be socialized differently in various gender and behavioral domains (Kagesten et al., 2016). Interestingly, we did not observe substantial variation in gender measures between younger VYAs (10-12) and older VYAs (13-15), despite the widely recognized assumption that gender socialization intensifies over the course of early adolescence (Hill and Lynch 1983).

6.3. What did we learn about VYA programming?

The gender norms package is acceptable - children, parents, and community members were excited and engaged in the program and it generated reflection and discussion. Qualitative results revealed multiple channels of influence that can be tapped in gender transformative programming- children to other children, siblings to siblings, and children to parents. The qualitative data also identified parent concerns that effective interventions must address, such as fear for their economic security as they age, reasons why they believe that early marriage may benefit their daughters and their desire for harmony in the home. Unsurprisingly, the study showed boys' entitlement, but also suggests that many girls view their brothers as important sources of support and advocacy. Furthermore, it indicates that boys can change and use their power and entitlement for positive action. This experience also demonstrates that the gender norms package is feasible to implement and scale given its relative low cost, reliance on existing networks of child clubs and the ability of the local staff to move forward with implementation even in very difficult circumstances with little outside support. An encouraging result is the fact that even in its abbreviated format, the package reached about 70% of parents and 60% of fathers, something many parenting interventions struggle with. In the future, implementers should pay close attention to implementation quality, monitoring participation at the community level to detect and correct any problems. Finally, the fact that even a three month intervention yielded significant effects highlights the transformative potential of this approach, although the importance of the parent and community elements needs further investigation.

These results yield concrete recommendations for implementing gender-transformative interventions. The use of videos and posters appears to be an effective strategy to engage parents. The sequencing of content should take into consideration the finding that interest in the intervention builds over time and schedule the most important videos or posters later in the intervention period. In addition, while the importance of formative research to ground gender-transformative programs is widely recognized, there is much less discussion of the decision of where to situate programs. In the future, this decision could be guided by a diagnostic and landscaping exercise to identify the social norms and reference groups at play in the desired outcomes. This information would inform implementation decisions, and ensure that programs take place in areas where gender norms transformation could have the biggest impact. Finally, quick feedback loops informed by a strong learning agenda will allow rapid iteration in program targeting and delivery, increasing the likelihood that normative interventions are delivered in a way that fosters change at all levels of the social ecology.

7. CONCLUSIONS

The importance of the early adolescent life stage in gender socialization is increasingly recognized, yet this population has not yet been thoroughly studied. VYA program efforts are in the early stage, with little rigorous evidence on what works, for whom, and under what circumstances. We address this gap by presenting quality assessment of gender-related measures of norms, attitudes, and behaviors for VYAs and their parents. Furthermore, our results suggest that including a parent component to a VYA gender transformative intervention may increase VYA's reports of gender equity in education and

household domains. This work provides a foundation for future gender research and intervention with this population, and identifies foundations for further development of additional measures, such as empowerment as a pathway to gender equality. We provide recommendations for furthering the development of VYA and parent measures of gender socialization in future research. Finally, based on the promising, though inconclusive results of this study, we suggest that researchers and practitioners continue to address the central question explored here, the value of working beyond the individual level of the ecological system. Carefully tailoring the intervention to address the normative factors related to girls education and early marriage in the specific setting, implementing the combined gender norms package as designed, and improving the evaluation by using the successful measures developed during this study, and complementing them with other measures, is an important next step in VYA programming.

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