

**THE IMPACT OF MOTHER'S VIOLENCE RATIONALIZATION ON THE  
SCHOOLING OF HER CHILDREN:  
AN EMPIRICAL STUDY**

by

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## **Abstract**

This study explores whether a mother's rationalization of intimate partner violence against wives is associated with the school entry of her children. The study uses the Nepal Multiple Indicator Cluster Survey with the sample comprised of 4,012 children within the school-studying age born to young mothers aged 19-35. It employs the bivariate probit model with an instrumental variable (IV) to analyze data. The IV reflects the attitudes toward IPV of older women residing in the same neighborhood. The results indicate that children born to mothers justifying abuse by husbands are 8.7 percentage points more likely to enter primary school late, which is 20% higher than the average level of late entrants. The probability of late entry goes up by 10.8 percentage points when examining only girls corresponding to 25% rise from the mean value. There is no statistically significant impact on schooling outcome of sons. The evidence that only the schooling of daughters is affected implies the presence of gender-based maltreatment related to cultural norms, which requires more integrated research involving those risk factors.

## **Keywords**

intimate partner violence, gender, Nepal, school entry

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## **I. INTRODUCTION**

Intimate partner violence (IPV) is one of the major social problems violating human rights. As the most prevalent form of violence against women, the recent data reveal that around 35% of all women worldwide have been victims of sexual, physical, or emotional abuse by the partners during their lives. Moreover, women homicides committed by their intimate partners make up 38% of all cases of adult women homicides around the world. Numerous studies provide evidence that IPV is widespread in many countries varying from 16% in high-income countries to 38% in low- and middle-income South-East Asian countries (WHO, 2013).

In fact, the impact of violence on women has many negative consequences on physical (headaches, injuries, preterm delivery, sexually transmitted diseases, and death) and mental well-being of victims (stress, depression, insomnia). In addition, there are adverse social effects - isolation from publicity, different restrictions minimizing individual freedom - as well as the possibility of unstable behavior that may lead to suicidal outcomes (Warshaw et al., 2009; Puri et al., 2011).

Young women are of special concern since violence against them in the period of personality formation and maturation may develop long-term mental health and social issues that can negatively influence their education and employment progress (Flood and Fergus, 2008). Workplace sexual harassment along with partner violence harm economic participation of women by affecting their job productivity and performance, which in turn may result in unemployment and high job turnover (Banyard et al., 2011; McDonald and Flood, 2012). According to the World Bank, violence against women imposes high economic costs and significantly reduces GDP.

While all those negative impacts of IPV on women are predicted and evident, there is little research analyzing women's rationalization of partner violence and

how it affects their children. Rationalization of abuse is a form of self-deception when women find a seemingly logical explanation for violent actions denying the need for support leading to more severe consequences. This defense mechanism prevents women to even realize the dangerous reality of their relationship with a partner, which indicates an unhealthy environment of the household. It is highly possible that actual violence takes place in households where parents hold intimate partner violence-justifying views. Exposure to violence at home may have various effects on children leading to behavioral, social, and mental issues (McCloskey LA and et al, 1995). Moreover, children who live in an abusive environment and regularly witness discriminatory practices toward women often become either perpetrators or victims of violence themselves. Indeed, children are abused in 60-75% of incidents when a mother has experienced violence (Osofsky, 2003). Furthermore, IPV-accepting parents as the main caregivers often fail to take decisions benefiting the development of their children resulting in maltreatment. Neglected children may be forced to work instead of attending school leading to skipping classes and poor learning outcomes. Therefore, children's late entry to school can be considered as a proxy for child maltreatment and violation of children's rights.

In fact, many developing countries face a problem of late entry into primary school, which may have major negative consequences. Some studies have shown that it leads to children's lower performance, grade repetition, and even dropping out of school (Wils, 2004). Moreover, the age of entry to school is a good measure of an efficient education system in countries that lack proper data on attendance and performance. Education as a key tool that can improve the well-being of people as well as the economic development of the country should be taken into consideration and closely explored, especially in low-developed economies. In view of that, this paper aims to analyze the correlation between mothers' tolerance for wife beating and their children's school entrance. What is the relationship between women's

justifying views on partner violence and child care?

There appears to be no empirical analysis made examining the reflection of violence at home on educational outcomes in Nepal. As a country that still has issues at the modern times such as discrimination of women, violence against them, child labor, and early marriage, it is significant to take actions that can influence social perceptions about women and increase women's knowledge about their legal rights and the seriousness of the problem. Using data from Nepal, this study empirically examines whether apparent factors such as financial and opportunity constraints are the only determinants of child's delayed school entry or responsibility also lies on social norms affecting mother's judgment of domestic violence act resulting in child negligence.

The main goal of the paper is to distinguish target group of concern, patterns of IPV justification and late school entry occurrence, and evidence that suggest a link between mother's misguided reasoning and educational outcomes of her children. The results can guide social, health, and educational workers dealing with the negative consequences of children's late school entry and help with developing related policies and programs.

In order to accomplish this task, a set of hypotheses were developed to measure the factors of late school entry. The first prediction is that intimate partner violence justification by women is positively associated with the children's late primary school entry. A second hypothesis checks if daughters are more affected than sons by mother's reasoning on domestic violence. Similarly, I verify if parents' higher education attainment, richest wealth quantile, and urban area of residence negatively influence late school entry occurrence, while the experience of discrimination by women, a large number of children in the household, mother's early marriage, and high age difference between spouses positively affect children's school admission. Due to the lack of important information also affecting children's school entry

such as child labour participation, family income, distance to school, an instrumental variable approach is used to deal with the endogeneity problem discussed in the methodology section.

## **II. The situation in Nepal**

Violence against women is a common problem in Nepal with every one in six married women experiencing physical abuse and one-third being a victim of sexual violence by the partner (Amin et al., 2014). Another survey on rural districts discovered that IPV was between 30% to 81% depending on the region and form of partner violence (Government of Nepal, 2012). While researchers mainly concentrated on figuring out the IPV prevalence, very low attention was given to attitudes toward partner violence in the country (Hindin, 2014). Nevertheless, the understanding of this issue and the attitudes of women are among the main factors responsible for this social issue. The social norms and gender ideologies based on a hierarchical system force girls and boys to violence (Cunningham and D'Arcy, 2017). Nepalese women constantly experience restrictions preventing them from fully enjoying education, work, and family life due to gender-based discrimination resulting from purity principles. In other words, many women are excluded from regular activities such as school and work attendance during their menstruation period. Some women are forced to sleep in dark rooms and use different bathrooms. Although it lasts only for a few days, such incidents happen every month and certainly lead to lower self-esteem and emotional distress of women (Cunningham and D'Arcy, 2017). These all social constraints and norms push women to experience shame and fear of losing public respect that results in them ignoring help or contacting the police when abused. This probably would do little good and might make things worse. The rates of violence justification in Nepal are quite high with 46% of boys and 42% of

girls out of 3000 surveyed aged 10-19 positively thinking that women should tolerate violence to keep harmony in the family. In particular, adolescents were asked whether a husband was justified in beating or hitting her under different situations in their opinion. In similar proportions, both boys and girls agreed that women should be hit at certain circumstances (Amin et. al., 2014). Similarly, Multiple Indicator Cluster Survey (MICS) 2010 reports that almost half of 15-19 adolescents (48%) were treated unfairly during their period (slept in a separate room), while it is over 70% in MICS 2014.

The government statistics report for 2011-2012 of Nepal shows that around 26% of children drop-out from primary school, where one of the main reasons was parents' low interest in and desire for child's attendance. In fact, the Gross National Enrolment Ratio computed by dividing the number of all students of various ages studying at the primary level by the number of age-appropriate students enrolled in the primary school was around 136% (Flash Report, 2012). This signifies that most of the children studying at the primary level were late-entrants.

Similarly, according to the Multiple Indicator Cluster Survey (2014) report, 740,000 children of primary school age and 100,000 of lower-secondary school age were not attending school in Nepal. These children are either late-entrants or never went to school. In addition, data show that compared to boys mostly girls were staying out of school. It is more likely that girls will never attend school since they tend to enter early marriage and focus on house errands. Nevertheless, delayed school entry can cause children to drop out in higher grades because of additional work in the market and home, which is especially the case for Nepalese boys in the poorest regions. When they achieve physical maturity many impatient teenagers lose interest in studying and start working to support their families. Other negative consequences of students' late entry to schools could be poor academic performance, grade repetition, lower earnings, and, hence, a loss of potentially successful human

capital. In fact, the repetition rate of students is the highest at primary and lower secondary school levels in Nepal among South- Asian countries.

The main reason behind this situation regarding education in the country is the absence of legislated compulsory education regulations and government monitoring. Likewise, there is a lack of policies and campaigns that can transform society's perception toward girls and their education (Ministry of Education & etc., 2016). Therefore, girls are more at risk being affected by violence justification of their mothers guided and lectured by older women since childhood. Girls often copy the behaviour and lifestyle of mothers. If it is also accompanied by them frequently witnessing unequal treatment of women in childhood, girls are at risk of devaluing education importance. However, going to school is solely in hands of parents and mothers have more bargaining power over matters related to girls. Therefore, it is expected that the acceptance of IPV is more likely to be associated with the girls' late entry.

Although the reason for low school participation, grade repetition, and dropping out of school is often associated with the school infrastructure, most of the public schools in Nepal have poor facilities allowing to compare the school entry of children born to IPV and nonIPV mothers (Thapa, 2011). Likewise, I am excluding the distance from household to the school as the main factor of educational outcomes because 94.7 percent of households were residing in less than 30 minutes from the nearest community school in 2010-2011 (Central Bureau of Statistics, 2011).

### **III. LITERATURE REVIEW**

There are numerous studies examining the prevalence of IPV accepting views in developing countries with the following two being most recent and a few examining the relationship between justifying attitudes of women towards IPV and education

of their children. In the first research, Tran, Nguyen, Fisher (2016) analyze 39 low- and middle-income countries including Nepal. They employed 2010-2012 Multiple Indicator Cluster Survey datasets with the sample varying from 5000 to 40000 households. The IPV views were measured by number of questions, which described different scenarios of when a woman deserves a beating: (1) she goes out without telling him, (2) she neglects the children, (3) she argues with him, (4) she refuses to have sex with him, (5) she burns the food. The positive value varied among different regions with the lowest in the Caribbean and Latin America, Central, and East Europe and the highest in South Asia and Central and West Africa. They found out that socio-demographic characteristics such as poor wealth quintile of the household, rural area of residence, having lower education level, being under 25 years old, or ever being in a union are all significantly correlated with IPV accepting attitudes in most of the countries. Interestingly, controlling for other factors they also discovered that more women compared to men held justifying views on partner violence against women in Asian and African countries, which are the main destinations associated with this issue. However, unlike this paper that made general research, this paper will analyze the issue in-depth by adding country-specific variables and provide more accurate result related to the status of women and the social problems leading to the IPV prevalence.

A second work on this topic was written by Joshi and Childress (2017) who used 2005 MICS data to examine attitudes toward IPV and its socio-demographic predictors in the Central Asian countries - Kazakhstan, Tajikistan, and Kyrgyzstan. The same five scenarios were included in the survey and the percentage of women considering violence justified varied from 12% in Kazakhstan to 74% in Tajikistan and Kyrgyzstan being in between with 45%. The authors identified that most likely women living in middle-class urban areas, having limited education, and who are Asian ethnic group members held justifying attitudes. In particular, women from

southern regions of Kyrgyzstan and the central part of Kazakhstan were more likely to accept IPV as normal. In comparison with people of Asian ethnicity, members of European ethnic group had less approving views though even among Central Asian groups difference exist. For instance, Uzbek women were more likely to support IPV than Kyrgyz women in Kyrgyzstan.

In addition, there are many other studies inspecting the correlation between socio-demographic features and attitudes towards IPV against women. Some studies measured individual characteristics associated with IPV acceptance such as age, ethnicity, and educational attainment. They found that most older women reject all situations of violence approval in several developing countries (Jesmin, 2015; Kishor and Subaiya, 2008; Rani and Bonu, 2009; Rani et al., 2004). Many works found a negative relationship between education level and violence approval (Rani et al., 2004; Lawoko, 2006; Oyediran and Isiugo-Abanihe, 2005; Antai and Antai, 2008; Rani and Bonu, 2009; Hindin, 2014). Finally, as obtained by Joshi and Childress (2017) ethnicity also plays an important role in IPV perception (Hindin, 2003; Oyediran and Isiugo-Abanihe, 2005; Antai and Antai, 2008). There are also papers focusing on household factors that can be responsible for IPV accepting mindsets. The household wealth level, age at marriage, and the age difference between partners were identified as determinants of approving view. For example, women who got married at the age above 18 were less likely to hold justifying views on the partner violence according to the analysis of Bangladesh population data and Demographic and Health Surveys on 23 countries (Jesmin, 2015; Kishor and Subaiya, 2008). On the other hand, the age difference between partners was not correlated with the IPV positive views (Kishor and Subaiya, 2008; Hindin, 2003). Lastly, the households with poor wealth index report higher IPV approving attitudes compared to households of rich quintile (Rani et al., 2004; Oyediran and Isiugo-Abanihe, 2005; Rani and Bonu, 2009; Hindin, 2014; Jesmin, 2015).

Regarding the association between IPV acceptance among women and children's school entry, the study made by Rende investigates this problem and find out that IPV acceptance is negatively related with only the girls' school attendance in Turkey. Using Demographic and Health Survey (2003) with 7,951 married or in union women, the author discovered that there is a 2.6 percentage points decline in the girls' school enrolment for girls whose mother rationalizes violence against a wife in four situations provided (if burns food, neglects children, goes out without telling, and refuses sex) . However, the author finds no effect on the boys' education outcome. There are also papers analyzing the factors influencing the primary school entry of children. One of them is made by Wils (2004) who examines whether the late entry of kids in Mozambique results in their dropping out of school. The author observes that children entering the school at the age between five and seven are predicted to finish eight grades, while those who enter being eleven-fourteen years old are predicted to finish only two grades.

Other works found that household characteristics such as income and opportunity constraints on parents ability to support a child's education to be responsible for the schooling outcomes of children. Some studies evaluated poverty as the main driver of low education performance of kids (Alcaraz and et al, 2012). A few other researchers focused on program quality variations within the school, distance to school, and price of schooling to the logic behind decisions related to schooling (Glick, 2008). Equally important, mothers' standing on decisions made in the household and her level of authority seem to be crucial determinants increasing the educational level of kids (Schuler and Rottach, 2010; DeGraff and Levison, 2009).

In addition, according to the report made on son preference, a higher share of Nepalese men indeed favor boys as the carriers of family name and lineage and providers later in old age. On the other hand, usually girls are expected to give emotional support and participate in the workload but after marriage are not ex-

pected to take care of paternal home at all. Moreover, the authors found that men who witnessed gender inequality in childhood tend to be more violent (Nanda and et al., 2012).

Unlike the previous works focusing on household's financial and opportunity constraints, this study explores the impact of mother's beliefs regarding violence against wives on the children's school admission. In addition, the unique instrumental variable approach is used to reduce endogeneity issue related to unobservable factors and obtain more reliable results. For my knowledge, there is no study published exploring the relationship between intra-household factors (mother's tolerance of abuse in marriage) and children's educational outcomes employing bivariate probit model with the IV (the attitude of older women toward IPV).

#### **IV. DATA**

The paper is based on Multiple Indicator Cluster Survey carried out in 2014 by the Central Bureau of Statistics in collaboration with National Planning Secretariat of the Government of Nepal and UNICEF Country Office. Specifically, the Nepal MICS 2014 was implemented with the aim to evaluate women and children's situations in the country by developing effective statistical management, hence, accurate data, which may be used as a tool for policy and programme changes related to women and children's wellbeing. This survey is the fifth MICS conducted in Nepal but the first one capturing the whole nation.

The survey includes valuable information on 12,405 households living in 520 enumeration areas (clusters). It is then divided into five datasets according to the type of information: (i) birth history of children; (ii) under 5 children's level data; (iii) household level data; (iv) household members' level data; and (v) data on women of age 15-49.

To form a working sample, datasets on women and household members were merged using a cluster, household and respondent's individual number of participants. The first data includes information on 14,162 women of age 15-49 who were successfully questioned. All participants were surveyed in-person and asked to answer a series of questions related to their background, use of IT and access to social/mass media, fertility, desire of last birth, maternal and infant health, post-natal checkup, illness signs, contraception, unmet need, opinion on domestic violence, marriage or union, sexual behaviour, and use of tobacco and alcohol. From these data, I extracted information on parents' characteristics such as age, attained education level, marital status, type of marriage, wealth index quintile, attitudes towards IPV and etc., the description of which can be seen in the next section. In order to construct an instrumental variable, this dataset was divided into two samples: i) young women under 35; ii) older women 36-49 years old. It is predicted that younger mothers have more children within the ages of attending school. To avoid losing too many observations, the sample was split at age of 35.

Next, the young women dataset was merged with the following household data, while older women dataset was left for later use. The second dataset was constructed according to reports given by household representatives. It covers a household list of all members including targeted children with information about age, gender, school attendance during the last two years, relationship with household head, parents of each person living in the household. Specifically, it included children's school participation and grade of education attended for 2012-2013 and 2013-2014 schooling years and age at beginning of the academic year only for the year of survey. This knowledge made it possible to exclude students who repeated the grade in 2013-2014, however, it was not possible to eliminate other cases of grade retention before that school year. Using the information on parents, incidents of father and/or mother absence in the household were as well dropped. Finally,

after putting listed restrictions, merging both datasets, and normalizing data the working sample comprised of information on 5,062 children of age 4,012 born to 2,314 mothers 19-35 years old who were married or in a union at the time of the survey.

This sample was then merged with older women's dataset, which included variables capturing attitudes of senior women towards IPV sorted by a cluster. Specifically, the average response to questions regarding violence justification of women residing in the same area was taken as an IV. As I also examine schooling entry of girls and boys separately, two samples were defined to consist of 1,997 and 2,015 observations, respectively.

## **V. Study Design**

For the analysis, the paper employs the following variables described in Table 1 in the last section of tables to understand the relationship between women's IPV justification and school entry age of their children.

School entry age of children was computed by using report of age at the beginning of 2013-1014 school year and grade attended at the time. I assume no grade repetition other than mentioned omitted cases. Next, I define students entering first grade at the official entry age or one year above as those who started the school on-time following the method of Yoko Nonoyama-Tarumi and et al.'s (2010) measurement concept. Since the official starting age is five years old, then children above age six are treated as late entrants. Children who entered school at age of four are considered together with on-time entrants in this study for simplification reasons. Hence, the dependent variable is a binary that takes value 1 when the age of school entry exceeds 6 and 0 otherwise.

Independent variables depict children's characteristics, parents' background,

and household features. Child's gender is incorporated since there is a high level of gender-disparity in education in Nepal. It is a binary variable equal to 1 if the child is a girl and 0 if it is a boy. A number of siblings under 15 is a continuous variable and is used to examine whether and how the presence of other children in the household affect entry to school. The prediction is that a higher number of siblings limit financial and emotional, thus, educational investments into each child. Likewise, observing children may need to take care of younger siblings or compete with older ones for parental attention and support.

Characteristics of parents represent age, education level, mother's attitude towards IPV and her experiences of discrimination, and type of marriage. As a base level, I take the age of a mother and set of binary variables capturing different age gaps between spouses. The age difference between partners may be an important factor affecting relationship health. In most occasions, when a woman is much younger than her husband, the role of a man becomes pivotal in the household decisions resulting in a weaker position of a woman. This may also affect the presence of violence and child's development. To capture this, a set of indicator variables were generated capturing different age gaps between spouses when the husband is: 0-5 years older; 5-10 years older; more than 10 years older; younger than his wife.

Mother's and father's attained level of education are other exogenous variables. The higher level of education of parents is associated with stronger responsibility for the child's welfare and the need for education. The original term is a categorical variable that was equal to 1 for no education, 2 - primary, 3 - secondary, and 4 - higher levels. In the study, I introduce two groups of three dummy variables for each category with no education taken as a base level to compare how different levels of education of each parent individually influence school entry of their children.

The main exogenous variable of interest is a woman's attitude towards violence from her husband is added to measure how it affects age entry of her children. To

assess young (19-35 years old) women's attitude towards IPV questions were asked in the following way:

Sometimes a husband is annoyed or angered by things that his wife does. In your opinion, is a husband justified in hitting or beating his wife in the following situations:

- A if she goes out without telling him?
- B if she neglects the children?
- C if she argues with him?
- D if she refuses to have sex with him?
- E if she burns the food?

I created a binary variable (mainly used) that equals 1 if a woman justifies violence in at least one of the situations and 0 if she totally disapproves. Next, a set of binary variables were generated for each scenario separately that takes value 1 for agreement and 0 for rejection of the statement.

Moreover, measures of discrimination against woman are added into the analysis to control for the impact of gender-related experiences since it may lead to lower self-esteem and bargaining power in the household. A dummy variable is generated that is equal to 1 if woman was treated differently during her menstrual period and encountered at least one of the following situations: (a) lived in a different house, (b) lived in different room of the same house, (c) lived in an animal shed, (d) ate different food, (e) bathed in separate place, (f) was absent from work or school, (g) avoided social gatherings. Also, another additional dummy variable was created to capture the impact of the extreme case when women had to live in an animal shed.

Regarding the type of marriage, arranged early marriage is a common event in Nepal when a woman starts her own family before turning 18. The social norms

force women to prioritize family and husband's authority, which leads to dropping out of school after marriage and having children early. Therefore, a dummy variable was created to analyze the relationship between early marriage occurrence and its effect on the child's education. It is equal to 1 if a woman got married before age 18 and 0 otherwise. Likewise, the variable corresponding to polygamous marriages is added to control for household variation in the sample.

Due to income and expenditure information absence, wealth index quintiles were included as a proxy for the household's financial wellbeing since it directly affects school financing and development of the child. The index is created by using information on ownership of consumer products, characteristics of dwelling, and of other assets that can depict wealth rank. The original data presents it as a categorical variable with value 1 displaying poorest households, 2 - second, 3 - middle, 4 - fourth, and 5 - richest. The exact derivation of the index can be found in the work of Filmer and Pritchett (2001). In this study, for each category four indicator variables were introduced representing each quintile, where the first quintile was used as a base level.

In addition, the study employs measures of household residence to prevent heterogeneity biases related to differences in the living environment and region. For that, a dummy was built to account for the area (urban/rural) and binary terms were constructed for all five regions: Eastern, Western, Central, Midwestern, and Far-western. In addition, the study uses information on the household head to control for bargaining power within the family.

Finally, instrumental variables were constructed to resolve the endogeneity problem created because of unobservables such as household income level or a number of available schools. It was done by capturing IPV tolerance of older women aged 36-49. Similarly to the variable reflecting attitudes toward IPV of young women, first, I created a dummy variable that equals 1 if a woman justifies IPV in at least

one of the listed situations. Then I generated a set of binary variables for each case, where the term is equal to 1 if a woman justifies beating by her partner and 0 if disagrees. Next, I generated instrumental variables by computing the average value of those variables in each cluster (enumeration area). It is a common case that young women are influenced by the opinion of elders (sisters, mothers, grandmothers, aunts) regarding family and life values, social and cultural norms. Therefore, this IV is a proxy representing older women's attitude toward IPV living in the same neighborhood as the investigated young mothers.

## **VI. Descriptive Statistics**

In Table 1, it can be seen that both young and old women have similar preferred situations to when violence is justifiable, though the share of senior women supporting IPV is lower compared to young women (50% vs 40% of the whole sample). It may be related to the agency or authority women gain with age. The most accepted case is when wives neglect children with 39% and 32% of agreement among young and old cohort, respectively. Going out without telling husband is the second situation voted as being a beating justifiable by 32% youth and 26% elders. According to the data, arguing with the husband is the third supported statement, where 22% of young and 19% of older women justified IPV. Finally, the last two cases - refusing sex and burning food - are the least approved situations when wives deserve beating. As could be predicted, individuals living in rural areas are more likely to have accepting attitudes toward partner abuse.

In total, there are 38% of children who started school later than the official entering age (Table 2). Using the dummy variable IPV, it was possible to divide women into two groups: women fully disapproving violence and those justifying IPV in one or more situation. In Table 2, the columns under nonIPV and IPV

represent summary results for the first and the second group, accordingly.

The main variable of interest - share of late entrants - is relatively higher in the IPV group than nonIPV (43% vs. 32%). Similarly, there are noticeable expected differences in the demographic characteristics of observing individuals across groups. Women in the IPV group have on average more children under 18 (2.26 vs 1.91). The percentage of mothers who have no education at all is 47% among nonIPV women compared to 65% in IPV group. Likewise, the share of uneducated fathers in the first group is lower - 17%, while it is 25% in the second group. Overall, more parents attained some level of education in the nonIPV group, which supports a negative correlation between literacy and IPV occurrence. According to the summary, there is a high number of women (67%) following the tradition of entering early marriage before turning 18. The percentage of early marriages across the IPV group is 72%, which is greater than in the nonIPV group (61%). The data supports the hypothesis that child marriage reinforces girls to be obedient and shapes their self-perception as someone else's property. These circumstances and girls' understanding of family matters allows for IPV to be a norm in families. The most important difference across groups is that over 92% of IPV women experienced discrimination during their menstruation period, which is another proof of inequality acceptance among women of interest. The proportion of discriminated in the nonIPV group is considerably lower - 44%. In addition, nonIPV group women generally live in a financially better household than IPV women (2.70 vs 2.25).

It could be predicted that: observing women's average age is almost the same in both groups - 30 years, while husbands' age is - 35 years. Hence, the average age gap between spouses is approximately 5 years. In both groups, there are a few households where women are head or live with in-laws (10% and 15%). Polygamous marriages do not prevail in the sample, comprising only 2%.

## VII. EMPIRICAL METHODOLOGY

I estimate the impact of women's IPV accepting views on the primary school entry of their children using a probit model. The dependent variable is the probability of late school entry of child  $i$  born to mother  $j$  conditional on the exogenous variables is equal to 1, if realized -  $Pr(Late = 1|X)$ . The independent variables with a distribution function of  $f(X)$  include an indicator measuring mother's approving attitude of violence -  $IPV_{jis}$ , where  $s$  is the specific situation (neglecting children, burning food, etc.); child's characteristics -  $X_i$ ; a vector consisting of parents' features -  $X_{pi}$ ; and a vector of household characteristics as wealth level, residence -  $X_{hji}$ . This model is also estimated for boys and girls separately, because daughters may be affected more due to social norms related to gender roles. The sample including all children will be referred to as the "total", while the sample of girls and boys as - "daughters" and "sons", respectively. The first equation represents aggregated  $IPV_{ji}$  when women accept wife abuse in least one of the situations, while the second captures response to each situation separately with  $IPV_{jis}$ .

$$Pr(Late = 1|X)_{ji} = f(\beta_0 + \beta_1 X_i + \beta_2 IPV_{ji} + \beta_3 X_{pi} + \beta_4 X_{hji}) \quad (1)$$

$$Pr(Late = 1|X)_{ji} = f(\beta_0 + \beta_1 X_i + \beta_2 IPV_{jis} + \beta_3 X_{pi} + \beta_4 X_{hji}) \quad (2)$$

In order to eliminate the endogeneity issue, the bivariate probit model is used since the dependent variable and independent term requiring instrumental variable are binaries. The model consists of the following equations:

$$Pr(Late = 1|X)_{ji} = f(\beta_0 + \beta_1 X_i + \beta_2 IPV_{ji} + \beta_3 X_{pi} + \beta_4 X_{hji}) \quad (3)$$

$$Pr(IPV = 1|Z)_{ji} = g(\gamma_0 + \gamma_1 ivIPV_{ji}) \quad (4)$$

The outcome variable (*Late*), *the probability of late entry into the primary school*, is depicted by a binary variable that captures two states. In the case when it takes

value 1 a child is assumed to enter the first grade late at the age above six, and when it's equal 0 - a child starts the school on time or early.

The empirical model evaluates the association between mother's accepting attitude towards partner violence and the schooling consequences of her child while controlling for other factors listed above. The main variable of interest, IPV approval ( $IPV_{mj}$ ), is a dummy variable that equals 1 if a woman justifies beating in at least one of the mentioned situations (goes out without telling, neglects children, refuses intercourse, argues, burns food) and 0 if she rejects all statements. In the model, the instrumental variable ( $ivIPV_{mj}$ ) is the average response to IPV questions of older women over 35 residing in the same enumeration area as the observing young mothers. Next, I also examine each situation separately to detect, which case requires special attention and future investigation. In other words, I include five binary variables capturing women's opinion regarding wife abuse by a husband in above described five scenarios.

The prediction is that coefficient  $\beta_2$  of the variable of interest will have a positive sign indicating an increasing likelihood of student's late school entry.

Child characteristics ( $X_{ci}$ ) include gender of the child and number of siblings. While the coefficient of gender is ambiguous, the coefficient of a variable representing a number of siblings is expected to have a positive sign.

Parents' characteristics ( $X_{pi}$ ) represent parents age, the age gap between spouses, education level, mothers' experience of discrimination, and type of marriage. The model expects to estimate a negative correlation between parents' education attainment and child's late entry since education controls for the value parents put on schooling. Mother's experience of discrimination is predicted to have a positive impact on late school entry. Regarding the type of marriage, indicators capturing child marriage indicator and polygamous type of relationship are included in the model. Both variables are predicted to have a positive correlation with the depen-

dent variable.

Household characteristics consist of *wealth index quintiles* as a proxy for household's financial wellbeing and family structure (living with in-laws), area, and region of residence to lower heterogeneity biases associated with the living environment differences.

### **VIII. Instrumental variable validity**

It is necessary to examine the validity of this instrument before discussing the estimated results. For that, there are two conditions that should be satisfied.

First is the instrument relevance, which means that the valid IV should be highly correlated with the endogenous variable while controlling for other independent terms. Therefore, I investigate the relationship between the endogenous variable - the attitudes of young women toward wife abuse by the husband and the instrumental variable, which is the average response of older women residing in the neighborhood to the same questions. To check the validity of other instruments created for each situation (neglects children, burns food) separately, the respective endogenous variables and IVs are regressed in the same probit model. According to the results in Table 3, the estimations of the IVs are statistically significant supporting the first relevance requirement.

The second condition for a valid IV is instrument exogeneity, which means that the IV should not be correlated with the error term. In order to satisfy this requirement, it is necessary to show that the IV, older women's opinion about IPV residing near young women of interest, is not associated with the dependent variable, the school admission of children born to investigated mothers. Because mothers-in-law are also included in the examined group of older women, one way to address the exclusion restriction could be by showing that the presence of mother-in-law in the household does not affect the schooling of grandchildren. Consequently, the

attitudes toward IPV of living-in mothers-in-law cannot affect the school entry of children residing in the same household.

To examine this, I regress the likelihood of children's late school entry on the binary variable capturing whether they live with their grandmother or not while controlling for all other factors. *Ceteris paribus*, the coefficient of the binary variable capturing mother-in-law presence is insignificant (Table 3). Assuming that there are no other ways that older women's opinions regarding wife abuse influences the schooling decisions of children, the employed instrumental variables are valid and can be used to reduce the endogeneity problem.

## **IX. RESULTS**

First, I test hypotheses regarding the factors affecting students' delayed school entry by running three probit models, where the dependent variable is dichotomous term - *Late*. Table 4 presents robust results where marginal effects indicate predicted probability of late entry to the school of children born to mothers justifying violence by husbands against them while controlling for listed explanatory variables. Then, I compute three bivariate probit models using an instrumental variable approach, the results of which are included in Table 5. The difference between the three models is in the employed sample, where the first captures all children, the second - only daughters, and the third - only sons. Lastly, Table 5 concisely includes estimations for each situation (neglects children, burns food, etc.) when IPV against wives is normalized by women, where each was run separately with all control variables.

Although results for simple probit models (raw) might be biased due to endogeneity, it was estimated and included for comparison reasons. Analyzing the results from Tables 4 and 5, it can be seen that raw coefficients have the same signs

and significance level as IV coefficients. However, raw predicted probabilities seem to be underestimated compared to IV outcomes. Next, I will focus only on IV results contained in Tables 5 and 6.

The variable *IPV* reflecting whether women justify violence in at least of the five situations is a key term influencing school entry in Models 1 and 2. When considering the whole sample, the probability of late entry increases by 8.7 percentage points. The positive correlation is significant and indicates that the failure to reject the first hypothesis that children's schooling is affected by mothers IPV rationalizing attitude. Compared to the mean value of 0.43 of the late entry for the IPV group (Table 2), this suggests a 20.23% rise in the likelihood of delayed school admission. The probability of late entry goes up by 10.8 percentage points when examining only girls, representing 25% increase from the average level. The probability of late school entry for sons is lower, by 5.8 percentage points, and is not statistically significant. The results for Models 1 and 2 are significant, which support the first two hypotheses: mothers' belief about IPV justification influences their children's schooling outcome; daughters are more affected than boys.

In Table 6, evaluating each situation separately gives slightly different results, where the coefficients are much lower and insignificant in most of the cases. For the first model that includes the whole sample, only justification of violence when wives go out without telling a husband seems to have a significant impact on children's schooling. Specifically, the probability of delayed school admission of children increases by 4.1 percentage points when mothers normalize IPV against wives in this situation (Table 6, column 3). Interestingly, it is the only situation when the marginal effect is significant for the sample of sons but not of daughters. The results show that the likelihood of late school entry for boys rises by 5.4 percentage points or by 12% from the mean value if mothers justify physical assault of a wife when she goes out without telling the husband. Among the provided situations in

the survey, curious results were obtained when women rationalized wife abuse for refusing sex. Unlike other coefficients, there is a negative correlation between IPV acceptance for refusing sex and children's school entry, where the marginal effect is statistically significant for the girls' sample. In particular, the probability of late entry of daughters decreases by 1.9 percentage points if a mother justifies beating for refusing intercourse. This means girls are more likely to enter primary school on time if their wives believe they deserve beating for refusing intimacy, which is hard to explain. The reason may be that mothers want their daughters to escape from a sexual assault that might be common in those households. Another explanation may be related to a small sample problem, because a few women agreed with the statement that a wife should be hit for refusing sex. In comparison, the likelihood of late admission to the school of sons is positively related to women's normalization of IPV for sex rejection, though the estimation is insignificant.

Returning to the main results with IV in Table 5, having a sibling is also positively correlated with the probability of late school entrance of students and is significant across Models 1 and 2 (by 1.2 and 2.5 percentage points). Indeed, daughters tend to take care of their siblings or compete with them for parental support, which affects their ability to start school on time.

According to results, there is a negative significant correlation between attained education of parents and probability late school admission indicating that literate parents highly value children's development. In the same manner, the variables reflecting mothers' gaining agency (age) and her being a household head have negative coefficients. In particular, as women get older the impact of age on children's school entry decreases. Likewise, as mothers become more independent and authoritative they tend to care more about the future of their kids and send to school on time. Although the estimations of the variable reflecting mother's experience of discrimination are insignificant, the margins have negative signs for total and

daughter's samples. This suggests that the probability of going to school on time is higher for children born to women who struggled with inequality. However, the variable capturing an extreme case of isolation during the menstrual period, when a mother was forced to live in an animal shed, has a negative significant correlation with the likelihood of late admission.

It was also expected that women who got married early before 18 or living with in-laws are more likely to lose bargaining power and authority regarding household decisions. Under the control of elders, young wives may accept violence as a necessary method of dealing with family issues and raise children with the same attitude toward marriage. Therefore, the positive results support this intuition that parents who married early do not prioritize education.

Curiously, the marginal estimations for dummies reflecting different spousal age gaps are negative, suggesting that having an older partner benefits education of children. As for wealth index quintile, results show that children who live in financially wealthier households have a higher probability to enter school late. It might be explained by the fact that these parents may afford to send their children to a private school or take private lessons. Similarly, living in an urban area increases the likelihood of delayed admission. Probably, it is related to wide schooling opportunities and choices in urban areas.

## **X. CONCLUSION**

While many studies analyzing the schooling outcomes of children focus on financial and opportunity constraints of parents, this work explores the impact of mother's beliefs, specifically, attitudes toward violence on children's school admission. Intimate partner violence is a common issue in Nepal, which requires more attention from the government, policymakers, scholars, and overall society.

To provide useful evidence, the paper employs bivariate probit model using the instrumental variable approach with the primary independent variable - women's IPV approval and the probability of children's school entry as the dependent variable, while controlling for child's, parents' and household characteristics.

As the result, I found out that factors significantly affecting school entry vary across samples. There are interesting results for the variable of interest representing attitudes of women towards partner violence. As proved, the estimations include valid evidence supporting the stated hypothesis that mother's justifying views on beating influence child's educational outcome, though the marginal effect is not large. Moreover, it exceeds the impact of other determinants such as household wealth rank and number of siblings. Another finding is that girls are significantly affected by their mothers who approve abuse against them by their husbands, sons are not sensitive to IPV justification by their mothers. This is consistent with the issue that women holding violence approving attitude tend to overestimate men's position and authority and, hence, care about their sons' development more than of daughters. The empirical results also show that attained education of both parents is the crucial determinant of children's school entry, but the extent of impact differs between girls and boys. The variation of the marginal effects across two samples (daughters and sons) indicate gender-related differences. These results suggest that parents unequally treat their daughters regarding the decisions related to education indicating gender-based maltreatment.

In conclusion, these results offer new research channels related to the importance of social norms and beliefs of mothers affecting schooling outcomes of their offsprings. The evidence that only schooling of daughters is affected by mother's justifying views on violence by her husband implies that there is a deep-rooted issue linked to gender inequality and cultural norms. This problem cannot be solved by eliminating the financial constraints of households by offering scholarships or any

other financial benefit. This issue needs more attention and integrated research allowing for analysis that considers social norms as a risk factor in order to lower gender disparities in education. However, more importantly, there is a need for making education compulsory through legislation and developing strategies that can affect societal behaviour change regarding women's education and improve monitoring of children at risk of late entry and dropping out.

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## XII. APPENDIX

**Table 1. Tolerance of women to IPV (agreement %)**

<b>Situations:</b>	<b>Young</b>			<b>Old</b>		
	<b>Total</b>	<b>Urban</b>	<b>Rural</b>	<b>Total</b>	<b>Urban</b>	<b>Rural</b>
1. Goes out	31.92	24.10	33.72	25.82	17.04	28.84
2. Neglects children	38.78	31.12	40.55	32.05	22.47	35.34
3. Argues	22.48	14.17	24.40	18.62	9.92	21.62
4. Refuses sex	4.51	2.11	5.06	3.68	2.12	4.22
5. Burns food	5.23	2.78	5.80	5.46	3.05	6.29
In total:	50.32	41.85	52.28	40.14	29.09	43.93
N:	4,012	755	3,257	4,611	1,179	3,432

**Table 2. Summary Statistics**

Variables	Total		nonIPV		IPV	
	Mean	Std.	Mean	Std.	Mean	Std.
Late entry (=1)	0.38	0.48	0.32	0.46	0.43	0.49
Child is a female (=1)	0.50	0.49	0.49	0.50	0.50	0.50
Number of siblings	2.08	1.20	1.91	1.18	2.26	1.21
Mother's age	30.7	3.35	30.6	3.33	30.73	3.37
Mother's education:Primary	0.17	0.38	0.19	0.39	0.16	0.36
Mother's education:Secondary	0.15	0.36	0.18	0.38	0.13	0.33
Mother's education: Higher	0.09	0.29	0.14	0.35	0.05	0.22
Mother has no education	0.56	0.49	0.47	0.49	0.65	0.47
Mother justifies IPV (=1)	.503	0.50	0	0	1.00	0
Mother experienced discrimination	0.68	0.46	0.44	0.49	0.92	0.26
Father's age	35.28	5.30	35.30	5.23	35.26	5.36
Father's education: Primary	0.25	0.43	0.24	0.42	0.27	0.44
Father's education: Secondary	0.31	0.46	0.33	0.47	0.29	0.45
Father's education: Higher	0.21	0.40	0.25	0.43	0.17	0.37
Father has no education	0.21	0.41	0.17	0.38	0.25	0.43
Early marriage (=1)	0.67	0.47	0.61	0.48	0.72	0.44
Spousal age gap	4.78	4.02	4.84	4.07	4.71	3.97
Household head is woman (=1)	0.10	0.30	0.10	0.30	0.10	0.31
Polygamous marriage (=1)	0.02	0.16	0.03	0.17	0.02	0.15
Household wealth quintile	2.47	1.47	2.70	1.52	2.25	1.38
Mother lives with in-laws	0.15	0.36	0.16	0.36	0.15	0.36
	N=4,012		N=1,993		N=2,019	

**Table 3. Regression Results for IV validity**

	Model 1	ME	Model 2	ME	Model 3	ME
IPVcluster	2.081***	0.829***	1.989***	0.793***	2.205***	0.876***
	(0.125)	(0.050)	(0.174)	(0.069)	(0.180)	(0.071)
ivnotell	1.439***	0.467***	1.320***	0.433***	1.570***	0.500***
	(0.112)	(0.036)	(0.155)	(0.051)	(0.164)	(0.052)
ivneglects	0.754***	0.275***	0.811***	0.302***	0.693***	0.245***
	(0.110)	(0.040)	(0.149)	(0.055)	(0.164)	(0.058)
ivargues	1.661***	0.423***	1.895***	0.478***	1.469***	0.369***
	(0.118)	(0.030)	(0.169)	(0.044)	(0.166)	(0.042)
ivrefuses	1.112***	0.055**	1.617**	0.081**	1.270*	0.048*
	(0.298)	(0.017)	(0.510)	(0.031)	(0.499)	(0.024)
ivburns	1.710***	0.117***	1.486***	0.084***	1.957***	0.135***
	(0.278)	(0.020)	(0.396)	(0.024)	(0.393)	(0.030)
Lives w in-laws	0.022	0.008	-0.016	-0.006	0.048	0.018
	(0.060)	(0.023)	(0.086)	(0.032)	(0.085)	(0.032)
R-squared						
N	4012	4012	1997	1997	2015	2015

Marginal effects

\*  $p < 0.05$ , \*\*  $p < 0.01$ , \*\*\*  $p < 0.001$

**Table 4. Regression Results**

	Model 1	ME	Model 2	ME	Model 3	ME
Mother justifies IPV	0.168*** (0.050)	0.064*** (0.019)	0.253*** (0.070)	0.095*** (0.026)	0.078 (0.072)	0.029 (0.027)
Child is a female	-0.034 (0.042)	-0.013 (0.016)				
Number of siblings	0.074*** (0.021)	0.028*** (0.008)	0.148*** (0.029)	0.056*** (0.011)	-0.010 (0.031)	-0.004 (0.012)
Mother's age	0.533*** (0.111)	0.201*** (0.042)	0.313* (0.152)	0.118* (0.057)	0.708*** (0.169)	0.268*** (0.064)
Mage in square	-0.008*** (0.002)	-0.003*** (0.001)	-0.005 (0.003)	-0.002 (0.001)	-0.011*** (0.003)	-0.004*** (0.001)
MPrimary	-0.206*** (0.059)	-0.076*** (0.021)	-0.327*** (0.086)	-0.118*** (0.029)	-0.088 (0.083)	-0.033 (0.031)
MHigher	-0.633*** (0.113)	-0.211*** (0.031)	-0.624*** (0.163)	-0.207*** (0.045)	-0.675*** (0.159)	-0.222*** (0.043)
MSecondary	-0.237*** (0.071)	-0.087*** (0.025)	-0.193 (0.100)	-0.071* (0.036)	-0.273** (0.103)	-0.099** (0.036)
Discriminated	-0.039 (0.054)	-0.015 (0.020)	-0.079 (0.075)	-0.030 (0.029)	0.006 (0.077)	0.002 (0.029)
FPrimary	-0.127* (0.061)	-0.048* (0.022)	-0.101 (0.088)	-0.038 (0.032)	-0.151 (0.085)	-0.056 (0.031)
FSecondary	-0.285*** (0.063)	-0.105*** (0.023)	-0.193* (0.088)	-0.072* (0.032)	-0.398*** (0.091)	-0.145*** (0.032)
FHigher	-0.411*** (0.080)	-0.148*** (0.027)	-0.437*** (0.114)	-0.156*** (0.038)	-0.389*** (0.114)	-0.140*** (0.039)

Earlymarr	0.183***	0.069***	0.135	0.051*	0.247***	0.092***
	(0.049)	(0.018)	(0.069)	(0.026)	(0.070)	(0.025)
Hubbydolder10	-0.040	-0.015	0.013	0.005	-0.072	-0.027
	(0.080)	(0.030)	(0.116)	(0.044)	(0.114)	(0.042)
Hubbyolder5	-0.011	-0.004	-0.012	-0.005	-0.004	-0.001
	(0.052)	(0.020)	(0.076)	(0.028)	(0.073)	(0.028)
Wifeolder	-0.094	-0.035	-0.007	-0.003	-0.101	-0.038
	(0.102)	(0.037)	(0.149)	(0.056)	(0.142)	(0.052)
Headwoman	-0.058	-0.022	-0.059	-0.022	-0.039	-0.015
	(0.069)	(0.026)	(0.098)	(0.036)	(0.101)	(0.038)
Polygamous	0.098	0.038	-0.028	-0.010	0.170	0.066
	(0.127)	(0.049)	(0.195)	(0.073)	(0.172)	(0.068)
Lives w in-laws	0.022	0.008	-0.016	-0.006	0.048	0.018
	(0.060)	(0.023)	(0.086)	(0.032)	(0.085)	(0.032)
Second quantile	0.001	0.000	-0.179*	-0.066*	0.157	0.060
	(0.059)	(0.022)	(0.084)	(0.030)	(0.085)	(0.033)
Middle quantile	0.009	0.003	-0.068	-0.025	0.079	0.030
	(0.071)	(0.027)	(0.104)	(0.039)	(0.097)	(0.037)
Fourth quantile	0.040	0.015	-0.071	-0.027	0.140	0.054
	(0.075)	(0.029)	(0.106)	(0.039)	(0.110)	(0.043)
Richest quantile	0.019	0.007	-0.044	-0.016	0.097	0.037
	(0.099)	(0.037)	(0.141)	(0.052)	(0.141)	(0.054)
Urban area	0.001	0.000	0.100	0.038	-0.107	-0.040
	(0.066)	(0.025)	(0.096)	(0.037)	(0.093)	(0.034)
Eastern	-0.028	-0.011	-0.077	-0.029	0.024	0.009
	(0.072)	(0.027)	(0.102)	(0.038)	(0.104)	(0.040)

Western	0.013	0.005	-0.045	-0.017	0.056	0.021
	(0.074)	(0.028)	(0.108)	(0.040)	(0.103)	(0.039)
MidWest	-0.088	-0.033	-0.170	-0.063	-0.012	-0.005
	(0.071)	(0.026)	(0.101)	(0.037)	(0.100)	(0.038)
FawrWest	0.041	0.015	0.033	0.012	0.034	0.013
	(0.069)	(0.026)	(0.098)	(0.037)	(0.099)	(0.038)
<hr/>						
R-squared						
N	4012	4012	1997	1997	2015	2015
<hr/>						

Marginal effects

\*  $p < 0.05$ , \*\*  $p < 0.01$ , \*\*\*  $p < 0.001$

**Table 5. Regression Results with IV**

	Model 1	ME	Model 2	ME	Model 3	ME
Mother justifies IPV	0.488*** (0.132)	0.087*** (0.021)	0.608*** (0.180)	0.108*** (0.028)	0.325 (0.196)	0.058 (0.033)
Child is female	-0.033 (0.042)	-0.006 (0.007)				
Number of siblings	0.069*** (0.021)	0.012*** (0.004)	0.140*** (0.029)	0.025*** (0.005)	-0.011 (0.031)	-0.002 (0.005)
Mother's age	0.534*** (0.110)	0.096*** (0.020)	0.327* (0.149)	0.059* (0.027)	0.702*** (0.168)	0.126*** (0.031)
Mage square	-0.008*** (0.002)	-0.001*** (0.000)	-0.005* (0.002)	-0.001* (0.000)	-0.011*** (0.003)	-0.002*** (0.001)
Mprimary	-0.190** (0.059)	-0.033*** (0.010)	-0.308*** (0.085)	-0.052*** (0.014)	-0.075 (0.083)	-0.013 (0.015)
Mhigher	-0.618*** (0.112)	-0.094*** (0.014)	-0.613*** (0.161)	-0.092*** (0.020)	-0.659*** (0.158)	-0.100*** (0.021)
Msecondary	-0.226** (0.071)	-0.039*** (0.012)	-0.183 (0.098)	-0.032 (0.016)	-0.262* (0.103)	-0.045** (0.017)
Discriminated	-0.035 (0.053)	-0.006 (0.010)	-0.076 (0.074)	-0.014 (0.014)	0.010 (0.077)	0.002 (0.014)
Fprimary	-0.121* (0.060)	-0.021* (0.010)	-0.096 (0.086)	-0.017 (0.015)	-0.145 (0.085)	-0.026 (0.015)
Fsecond	-0.288*** (0.062)	-0.050*** (0.011)	-0.202* (0.087)	-0.035* (0.015)	-0.396*** (0.091)	-0.068*** (0.015)
Fhigher	-0.415*** (0.079)	-0.069*** (0.012)	-0.443*** (0.112)	-0.073*** (0.017)	-0.391*** (0.114)	-0.066*** (0.018)
Earlymarr	0.181*** (0.048)	0.032*** (0.008)	0.132 (0.068)	0.023 (0.012)	0.246*** (0.069)	0.043*** (0.012)

Hubbyolder10	-0.037	-0.007	0.019	0.003	-0.072	-0.013
	(0.079)	(0.014)	(0.114)	(0.021)	(0.113)	(0.020)
Hubbyolder5	-0.012	-0.002	-0.013	-0.002	-0.006	-0.001
	(0.051)	(0.009)	(0.074)	(0.013)	(0.073)	(0.013)
Wifeolder	-0.085	-0.015	-0.002	-0.000	-0.091	-0.016
	(0.101)	(0.017)	(0.147)	(0.026)	(0.141)	(0.024)
Headwoman	-0.050	-0.009	-0.048	-0.009	-0.035	-0.006
	(0.069)	(0.012)	(0.096)	(0.017)	(0.100)	(0.018)
Polygamous	0.090	0.017	-0.031	-0.005	0.161	0.030
	(0.125)	(0.023)	(0.190)	(0.034)	(0.171)	(0.033)
Lives w in-laws	0.018	0.003	-0.018	-0.003	0.043	0.008
	(0.059)	(0.011)	(0.085)	(0.015)	(0.084)	(0.015)
Second quantile	0.008	0.002	-0.170*	-0.030*	0.163	0.030
	(0.059)	(0.010)	(0.083)	(0.014)	(0.084)	(0.016)
Middle quantile	0.021	0.004	-0.053	-0.009	0.088	0.016
	(0.070)	(0.013)	(0.103)	(0.018)	(0.097)	(0.018)
Fourth quantile	0.051	0.009	-0.053	-0.009	0.144	0.026
	(0.075)	(0.014)	(0.105)	(0.018)	(0.109)	(0.020)
Rich quantile	0.028	0.005	-0.028	-0.005	0.099	0.018
	(0.098)	(0.018)	(0.139)	(0.025)	(0.140)	(0.026)
Urban area	0.027	0.005	0.124	0.023	-0.083	-0.015
	(0.066)	(0.012)	(0.095)	(0.018)	(0.095)	(0.017)
Eastern	-0.041	-0.007	-0.084	-0.015	0.009	0.002
	(0.072)	(0.013)	(0.101)	(0.017)	(0.104)	(0.019)
Western	0.008	0.001	-0.045	-0.008	0.048	0.009
	(0.073)	(0.013)	(0.106)	(0.019)	(0.102)	(0.019)
MidWest	-0.106	-0.019	-0.182	-0.032	-0.032	-0.006
	(0.070)	(0.012)	(0.100)	(0.017)	(0.100)	(0.018)

FarWest	0.007 (0.070)	0.001 (0.012)	0.000 (0.098)	0.000 (0.018)	0.005 (0.100)	0.001 (0.018)
<hr/>						
IPV						
IPVcluster	2.119*** (0.099)	0.313*** (0.016)	2.078*** (0.140)	0.305*** (0.022)	2.162*** (0.140)	0.319*** (0.023)
<hr/>						
R-squared						
N	4012	4012	1997	1997	2015	2015

Marginal effects

\*  $p < 0.05$ , \*\*  $p < 0.01$ , \*\*\*  $p < 0.001$

**Table 6. Regression Results: situations with IV**

	Model 1	ME	Model 2	ME	Model 3	ME
notell (d)	0.367*	0.041*	0.209	0.024	0.503*	0.054*
	(0.174)	(0.018)	(0.249)	(0.027)	(0.245)	(0.023)
neglects (d)	0.361	0.051	0.551	0.078	0.062	0.009
	(0.226)	(0.029)	(0.283)	(0.074)	(0.369)	(0.008)
argues (d)	0.095	0.008	-0.118	-0.010	0.297	0.023
	(0.192)	(0.015)	(0.242)	(0.020)	(0.302)	(0.021)
refuses (d)	-0.501	-0.009	-1.247*	-0.019*	0.575	0.009
	(0.845)	(0.014)	(0.528)	(0.006)	(0.999)	(0.012)
burns (d)	0.503	0.009	-0.443	-0.007	0.966	0.018
	(0.850)	(0.014)	(1.245)	(0.020)	(1.300)	(0.017)
notell= ivnotell	1.540***	0.183***	1.484***	0.188***	1.596***	0.177***
	(0.094)	(0.093)	(0.131)	(0.130)	(0.134)	(0.134)
neglects=ivneglects	1.154***	0.156	1.181***	0.158***	1.120***	0.157***
	(0.088)	(0.087)	(0.121)	(0.120)	(0.128)	(0.127)
argues=ivargues	1.650***	0.172***	1.743***	0.199***	1.557***	0.147***
	(0.103)	(0.102)	(0.147)	(0.146)	(0.144)	(0.143)
refuses=ivrefuses	1.969***	0.097***	2.255***	0.163***	1.715***	0.035***
	(0.270)	(0.269)	(0.383)	(0.383)	(0.368)	(0.368)
burns=ivburns	1.964***	0.060	1.921***	0.107	2.009***	0.039
	(0.372)	(0.250)	(0.373)	(0.372)	(0.357)	(0.356)
R-squared						
N	4012	4012	1997	1997	2015	2015

Marginal effects

\*  $p < 0.05$ , \*\*  $p < 0.01$ , \*\*\*  $p < 0.001$