

EFFECT OF URBANIZATION AND LEVEL OF EDUCATION  
ON WOMEN'S AGE AT MARRIAGE  
IN YEMEN, 1997

by

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## DEDICATION

To  
My Parents,  
Asmita D. Shah, Dinesh V. Shah  
My Inspiration

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ABSTRACT

EFFECT OF URBANIZATION AND LEVEL OF EDUCATION,  
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Women's oppression and gender inequality have become predominant concerns of our times with the emergence of concepts such as social justice and human rights. Even after years of intervention, we still find ourselves in the midst of the same struggle. In under developed and developing nations, women are still considered property of the dominant male of the family. This study examined the effects of urbanization and level of education on women's age at marriage. By

studying these effects, we try to test the efficiency of developing social culture and its effectiveness.

A regression analysis comparing the effects of urbanization and level of education found that level of education was significant at .000 levels, with a slope of .268 whereas, slope of Place of residency is .015, not significant at the .05. With the addition of interaction variable, place of residency became significant and level of education remained significant. Social work implications and theory is discussed.

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# CHAPTER 1

## INTRODUCTIONS

### 1.1 Yemen

According to United Nations Development Programme (UNDP), Yemen is the poorest countries in the Arab region with 47.8 % population living under the national poverty line. Its growth rate is 3%, which puts it as one of the highest population growth rates countries in the world (UNDP, 2009). Its current population is 22.5 million, of which 24% of the population lives in urban areas and 76% in rural (UNDP, 2009). The youth population (15 years to 24 years) constitutes 5.2 million, out of which 2.5 million are females (UNDP, 2009). UNDP further reports its total adult illiteracy rate to be 45.3% of which 29.6% is male illiteracy rate and the remaining 69.7% is female.

Before 1980, North and South Yemen were two separate countries, the Yemen Arab Republic and People's Democratic Republic of Yemen. Yemen Arab Republic (YAR), also known as North Yemen was ruled by the Ottoman Empire, which dissolved in 1918, after which the leader of Zaydi community, Imam Yahiya took over the empire (Gause, 1988).

YAR later joined United Arab States along with Egypt and Syria between the years 1958 and 1961(Gause, 1988). In 1970, Yemen Arab Republic (YAR) was finally recognized by Saudi Arabia.



Figure 1.1 Political map of Yemen



Figure 1.2 Physical map of Yemen

People's Democratic Republic of Yemen, also known as South Yemen was ruled by British for ninety-seven years (1839 -1937) as part of British India Company (Gause, 1988). The company first captured Aden in 1839 and slowly spread their power in remaining territories (Gause, 1988). The National Liberation Front (NLF) and Front for the Liberation of Occupied South Yemen (FLOSY) fought against the British and by 1967 NLF was able to capture most of the territories of south Yemen (Gause, 1988). By 1969 NLF gained all the power in South Yemen and changed the name of the country to People's Democratic Republic of Yemen (Gause, 1988). The two countries finally merged in 1980.

Merging of two countries with different histories brought together people with different perspectives and beliefs. This has led to a mixed society with few section of modernization and few traditionalists. J. Peterson in, Yemen: the search for a Modern States, states, “Most Yemenis, to a varying extent, are caught in the ‘limbo’ between the modern and the traditional” (1982). These changes have led to new cultural trends and adaptation of new lifestyles. Women have now started to show an inclination towards education. 63% of women now desire to have their daughters educated till high school and support them to work outside the homes (Sunil & Pillai, 2010). Also, cases of girls like Nojoud Mohammed Ali, who fought for her divorce at the age of eight, serves as an inspiration to other women in Yemen.

## 1.2 Problem

In recent years, all Islamic countries have experienced a decline in fertility rates, with the exception of Yemen (Pillai, 2004). Yemenis families continue to have an average of seven children (Pillai, 2004). Yemen also has the lowest age at marriage among Arab countries. According to the USAID (2010),: “nearly half of all Yemeni girls are married by age seventeen, 14% are married by age fourteen, and in some rural communities girls as young as nine are betrothed”. Early marriage age is a major contributor to high fertility rate, population growth and morbidity rate in Yemen (USAID, 2010).

Early marriage can often lead to early motherhood in Middle East countries hence increasing the fertility rate. One of the major repercussions of early motherhood is the significant health risks. Singh, Susheela, Samara, and Renee (1996) in their article, *Early Marriage among Women in Developing Countries* states, “Early pregnancy poses great health risks for a young woman and, if she carries the pregnancy to term, for her infant; these risks are exacerbated by poverty and inadequate access to maternal and child health services”. The chance of risking infant’s health and jeopardizing the future of these children increases when they are born in large families, where a single woman has the responsibility of seven children. Not to mention that 47.8% of the population is living under the National Poverty Line.

The consequence of early marriage to an extent contributes to high infant and maternal mortality rates. The infant mortality rate, i.e., 75 deaths per 1000 live births, in Yemen is ranked among the highest in the world (Sunil & Pillai, 2010 p. 9). Though the mortality rate is declining, it still remains amongst the highest in the world. Moreover, the maternal mortality rate which is 351 per 100,000 live births represents almost 42% of all deaths among Yemeni women aging between 15 to 49 years (Sunil & Pillai, 2010 p. 9).

Yemen is an Islamic country that for the past several decades has always and still continues to follow Islamic laws. Its development though exists; is still in



its nascent stages. Centuries of beliefs and cultural trends cannot be changed in a few decades of progress towards “modernization”. This mixed population creates a variety of difference of opinion, therefore leading to variation in people’s beliefs and rituals. The factors influencing the age at marriage are education level and place of residency(urban or rural) of the women (Sunil & Pillai, 2004).

With the spread of modernization, changes in the structure of key institutions such as family are likely to take place. Such institutional changes are accompanied by transformations in reproductive behaviors and fertility (Bhattacharya, 2006). However, the spread of modernization is dependent upon both adoptions of modern values as well as the presence of modern institutions, which can effectively disseminate modern values. Even when new modern institutions are established, the pace of change at times tends to be slow (Aghajanian, 1991). All these sources of constraints contribute to uneven spread of modernization and hence reproductive behaviors patterns in any country (Aghajanian, 1991).

The issue of urban-rural variations in age at marriage as an important component of reproductive behavior in Yemen has not been adequately investigated. The purpose of this study is to examine the urban-rural differences in age at marriage in Yemen by taking into account variable such as education, which are known to influence age at marriage.

## CHAPTER 2

### LITERATURE REVIEW

#### 2.1 Women and Marriage Trends in Arab Countries

In Islamic culture, gender roles are predefined, the Qur'an states, "Men are the protectors and maintainers of women, because God has given the one more strength than the other, and because they support them from their means. Therefore, righteous women are devoutly obedient and guard in the husband's absence what God would have them guard" (4:34). These defined roles reflect the current culture in Arab countries where the governing laws are Islamic laws.

Women in Arab culture do not enjoy many rights as do men. Women are often associated with household and household chores whereas men are more commonly associated with working outside and earning money for his family. This has played an important role in the current condition of women in many societies including Yemen. The cultural beliefs and designated roles given to women have formed the basis of the current marriage trends in the Arab world.

Yemen's majority of population follows Islam, though there are small groups of Jews, Christians etc. but they too are compelled to follow Islamic laws. Muslim women do not enjoy many rights, but in some urban regions women have

an upper hand compared to their rural counterparts. Saadawi (1982) describes women conditions by stating, “After marriage a rural young woman moves to live in her husband’s household and to become a servant at the disposal of all the family members especially the mother-in-law. She works in the field, procures water, looks after cows and sheep and does numerous household chores. He will beat her if he feels she is being lazy or disobedient towards him or his mother. He may divorce her if she falls ill, grows older, does not bear him children, gives birth to females only, disobeys his orders, answers back or rebels in any way. She soon loses her youthfulness due to exhausting labour, under-nourishment and often repeated pregnancies”. However, this may not be the case in every household, but the majority of Arab women face hardships as described.

Marriage in different cultures in signifies different things. As Lindgren (2009)states, it could connect to few or all of the following:

- A ceremony
- A formal registration
- Inflexibility in choosing future and rights
- A change in social status, obligations and rights
- Having sexual relations becomes socially (or legally) sanctioned
- The couple starts to live together

- A new household is formed

In Arab culture, marriage binds not only two individuals but also two families; therefore, in Arab culture, marriages are considered a social and economic contract (Rashad, Osman and Roudi-Fahimi, 2005).

In recent years, there has been an increase in age at marriage in many Arab countries. Even then countries like Oman, Yemen and Egypt reports early marriages as a common trend. 17% Omani and Yemeni women marry between age fifteen to nineteen and 60% marry between the age of twenty to twenty four (Rashad, Osman and Roudi-Fahimi, 2005). Many argue the reason behind such practices is traditional values of associating girls with the family's honor.

Islamic laws permit a man to have up to four wives with agreement of the other wives. In addition, the law also permits a man to marry women/girl from other religions but none of these laws apply same for the women (Harris, Marshall & Schvaneveldt, 2008). This is based on their belief that Islam is passed through paternal line (Harris, Marshall & Schvand, 2008).

Another trend in Arabian marriages is the age gap between the husband and wife. Rashad, Osman and Roudi-Fahimi, (2005) states, "one-quarter of recent marriages in Egypt and Lebanon had women at least 10 years younger than their husbands". Another unique trend observed was in Palestinian marriages, where 12% of women aged between thirty five to thirty nine years had never been

married, reason being that Palestinian men were allowed to marry with women of the west bank but, women from Palestinian were not allowed to do so.

Consanguineous marriages are popular in the Arab world, especially among the lower economic groups. Jurdi and Saxena (2003) define consanguineous marriages as, “marriages or unions between individuals of the same blood”. In a study by Jurdi and Saxena, “the prevalence and correlates of consanguineous marriages in Yemen: similarities and contrasts with other Arab countries”, have explored the effect of economic status, urban/rural living and education on this marriage trend. This study is based on YDMCHS data of 1997. The consanguineous marriage rate in Yemen (39.9%) was higher among other Arabic countries such as Egypt (39%), Syria (38%), Algeria (36.4%), Kuwait (36%), Bahrain (32%) and Lebanon (21%). Also, the hypothesis that, “the lower the socioeconomic characteristics of individuals the higher the prevalence of consanguineous marriages in the population”, was supported. However, the urban-rural impact on consanguineous marriages was not statistically significant. The study also found that there was a significant effect of age at marriage on consanguineous marriages. Overall, the study concluded that there was a rise in consanguineous marriages in Yemen. According to Jurdi and Saxena (2003), this could be attributed to high fertility rate, as there is more availability of cousins and low socioeconomic conditions.

In recent years, new policies and reforms have been able to show change in these patterns. Women activists and reformists are coming forward and reinterpreting Islamic laws in order to improve women's life in these countries. They are advocating for laws of late marriages, divorce, inheritance and child custody (Rashad, Osman and Roudi-Fahimi, 2005). In 2004, Morocco adopted a new Family law, in which it gives both men and women right to create their own marriage contract and raised the age at marriage from 15 to 18 for girls (Rashad, Osman and Roudi-Fahimi, 2005). Another law passed by Egyptian government gave women the right to initiate divorce without the consent of her husband. But this was allowed under the condition if she was ready to give up her few financial rights, later also allowed children of Egyptian mothers to become citizen of the country irrespective of their father's nationality (Rashad, Osman and Roudi-Fahimi, 2005). Such laws have helped women to uplift their status in society and step by step gain rights.

Women advocate agencies have also started to raise their voices against financial burden that women's family experience during their time of marriage. Rashad, Osman and Roudi-Fahimi (2005) in their article states that, "Some religious, governmental, and nongovernmental agencies have begun to shape national marital policies in order to lower the financial barriers to marriage. These

policies include organizing group marriages and providing financial assistance to young couples”.

Rashad, Osman and Roudi-Fahimi (2005), further states, “—the growing numbers of young people in the Arab world, and the economic and social realities that surround marriages in the region today—make this an important time to explore both changing Arab marriage patterns and their implications for people’s lives and societies as a whole”. This modernization is expected to reflect in the traditional marriage system of the Islamic world where women will be given more rights and authority over their lives than their previous generation.

Yemen like other Arab countries has also seen change in the trends of women’s rights and liberties. Sunil and Pillai in their study found, 85% of Yemeni women in 1991 had no education whereas according to the same survey data of 1997, this percentage declined to 79 (2010). This was not the only changing trend they found; they also noticed 12% drops in women’s desire to have more children from 1991 to 1997 (Sunil & Pillai, 2010). These changes reflect the changing trends in Yemen.

## 2.2 Age at Marriage

Early marriages though illegal in most countries, are still a common practice in developing and underdeveloped countries. According to UNICEF (2001), this practice is common in regions like Sub-Saharan Africa and South Asia whereas in the Middle East, North Africa and some parts of Asia, marriages before, during or shortly after puberty are common among people who live traditional lives. However, with increasing modernization and awareness concerning the consequences of early marriages there is a change in trend. It is expected that people living in urban areas that have more access to education and are exposed to alternative options will be willing to delay age at marriage.

Several studies and research have shown urban-rural differences reflected in many social and cultural behaviors and trends. Women living in urban areas are more likely to postpone their marriage than as compared to women living in rural areas. These differences are due to the higher level of exposure to modern values in urban areas. Urban living gives women an opportunity to keep distant from strict family values and traditions.

### *2.2.1 Urban-Rural Differences*

Researches have demonstrated that urbanization has changed the way people think and perceive. It has also altered people's attitude towards values, tradition, religion and culture as a whole. Urbanization is not merely a process of



immigrating to the nearest city, but it is considered a process of adapting to a new life style and socialization process. Urbanization is considered a culture in itself, whereby there is more emphasis on economic status, liberal values and human rights.

Carapico (2005) states, in the book Sana, the capital of Yemen, “young Sana’ani women from all classes are increasingly abandoning the “traditional” full veil in favor of this more modern look. Even women who wear veils now consider the bare faced look as perfectly acceptable Islamic dress”. In addition, it is observed that women are working as lawyers, judges, directors and administrators (Carapico, 2005).

Another instance found in Saadawi (1982), describes differences in urban-rural life as being, “a girl in the village, whether Moslem or Copt, has no right to love a man or choose her husband, contrary to what is now the case with urban female university students. This is becoming more and more common in the big cities of Egypt and other Arab countries where girls can receive a university education and then work, thus gaining a certain degree of independence as a result of the money they earn. But in the rural areas a girl cannot permit herself to act in this way. She may secretly fall in love with a neighbor’s son but she keeps this fact to herself and knows that she will be married off against her will by the men and elder women of the family.”

Rahman, Mahfuzar, Islam, Nurul, Hossain & Golam (2009) studied the differences of age at marriage in urban and rural Bangladesh using Bangladesh Demographic and health survey of 2004 for analysis. The study found, “More than 85% of women living in urban areas get married before the legal age whereas for rural women this figure is very high (more than 90%)” (Rahman et al. 2009). Irrespective of legal age at marriage being eighteen years, the results observed the mean age at marriage to be below the eighteen years (Rahman et al. 2009).

A similar study by Balakrishnan based on four Latin American countries, Mexico, Costa Rica, Columbia and Peru. The study includes total data of 3000 women married from each country aging 15 to 49. Balakrishnan's (1976) hypothesized, “A woman whose childhood socialization took place in a rural setting is likely to be influenced by favour a larger family and an early entry into marriage”. The results supported his hypothesis and indicated that women with childhood socialization in city married or residing in town with population more than 2500 had a higher mean age at marriage (Balakrishnan, 1976).

A study on the region of Amhara showed that 44 % of urban girls were married between twelve and fifteen years whereas this percentage for rural was 53% (Ababa, 2006). In addition, women who married in an appropriate age in urban areas were 26.6% and in rural was 16.2%. All the above mention studies

point out that with urbanization a social change has been observed even in the most conservative societies.

### *2.2.2 Effect of Level of Education*

Similar to urbanization, education also plays an important role in changing people's attitudes. A study, found that women with a minimum secondary education married later as compared to women with no education (Balakrishnan, 1976).

Balakrishnan (1976) studied impact of level of education on age at marriage in Mexico Columbia, Costa Rica and Peru. He found that, for women with no education, the mean age at marriage was 17.25, with primary education was 18.94 and with minimum of secondary education was 20.29 (Balakrishnan, 1976). It is found that women with secondary education are less likely to marry early, in fact countries where the major portion of women acquire minimum of secondary education have a lower rate of adolescent marriages (Singh, Susheela, Samra& Renee, 1996).

There is a strong connection between the level of education and women's age at marriage. Many studies have found that women with higher education are likely to marry late then women with no education. Sunil & Pillai (2010) states, "For educated women, the presences of several competing alternatives to marriage often result in the postponement of marriage".

Though there are a number of studies that support the positive relation between age at marriage and education, conversely few studies state otherwise. Dommaraju, (2009) studied the relationship between marriage timing and education on women aged between fifteen and nineteen in India. He reported that there was no significant effect of marriage timing and schooling between 1981 and 1991(Dommaraju, 2009). However, a slight statistical significance was found on the changes in marriage timing between 1991 and 2001 (Dommaraju, 2009).

Level of education has other effects, such as use of contraceptives and low fertility rates. It is reported that use of contraceptive in developing countries is much higher among urban and well-educated population then compared to rural and less educated populations (United Nations, 1995). Similarly, Dixon-Mueller reports, positive relation of education with contraceptive knowledge and use and its negative relation with high fertility rate.

### *2.2.3 Causes of Early Marriages*

In order to understand early marriages it is important to examine the factors that have led to such phenomena. Ababa (2006), in his study found six major causes of early marriages in the region of Amhara are:

- Historic Explanation
- Poverty/Economic Causes

- Lack of Knowledge: Parents ignorance of early marriage consequences
- Traditional/Cultural Values
- Limited Law enforcement activity
- Premarital sex and pregnancy among youth

Many underlying causes including the above mentioned, leads to practices like early marriages. Early marriages though many times is looked as a tradition of a religion or a culture, but often it is the result of prevention and protecting girls from social evils. For example, according to human rights watch and amnesty international report (1997), few families in Northern Uganda prefer getting their daughters married to militia at a young age to protect themselves and their daughters from being victims of sexual abuse.

In few cultures, early marriage is a preventive measure against premarital sex. The fear of pre-marital sex is so extensive that in countries like North-East Africa and a few parts of Middle East, female genital mutilation is practiced (UNICEF, 2001). Genital mutilation means, surgically restricting the ability of a girl to have sex or any kind of sexual pleasure (UNICEF, 2001). As a result, of the fear of girls becoming attracted to opposite sex in schools, many families often make their daughters drop out from school as soon as they reach their puberty age (UNICEF, 2001).

In Pakistan, by the age of five girls learn to limit themselves to their homes and behave in accordance with their father's wishes (UNICEF, 2001). In fact, women are appreciated for their self-control, obedient behavior and are expected to serve their fathers, husbands and sons all life. If women disobey, they often are punished physically and mentally. In Kenya, it is approved to react violently against disobedient wives (Muthengi, 2000). UNICEF concludes by stating, "In Pakistan as elsewhere, the younger the bride, the more chance of conditioning her into the appropriate subservient behavior" (UNICEF, 2001).

In many cultures, women are associated with honor of the family and therefore, these cultures prefer their daughters to get married early to ensure that she is a virgin at the time of marriage. In Amhara, early marriage is associated with family status; if the girl is not married early then it is seen as a failure on part of the parents (Ababa, 2006). He further adds early marriages gives bridegroom family's opportunity to bond (Ababa, 2006).

### 2.3 Early Marriage Repercussions

A significant portion of women marries early in developing countries (Singh, Susheela, Sharma & Renee, 1996). According to a study by Singh, Susheela, Sharma and Renee (1996), between 20% and 50% of women in developing countries are married or are in union by the age of eighteen and between forty and 70 % by the age of twenty. Early age marriage results in many repercussions that are related to social, economic and health problems (Jain &

Kurz, 2007). There are also studies that prove an association between early marriage and early motherhood (Singh, Susheela, Sharma & Renee, 1996) that could lead to health problems for both mother and the child.

### *2.3.1 Early Marriage and Motherhood*

There is a strong association between early marriage and child bearing at young age (Singh, Susheela, Sharma & Renee, 1996). Among the developing countries, one third of the women become a mother before the age of twenty (save the Children, 2004). It is found that early motherhood is often the result of family pressure on the newly wedded girls to prove her fertility (Mathur, Greene and Malhotra 2003; Blesdoe and Cohen 1993; Mensch, Bruce and Greene 1998; Malhotra et al. 2003).

Early pregnancies have been proved to increase health risks to not only the mother but also to the child (Senderowitz, 1995). The obstructions in labor and pregnancies create high rates of maternal mortality (Mathur, Greene and Malhotra 2003; Blesdoe and Cohen 1993; Mensch, Bruce and Greene 1998; Malhotra et al. 2003). One of the major reasons of high maternal mortality rate is the unprepared body of a young girl for childbirth (Mathur, Greene and Malhotra 2003; Blesdoe and Cohen 1993; Mensch, Bruce and Greene 1998; Malhotra et al. 2003). Girls between the age group of ten to fourteen years are five times more likely to die during pregnancy and childbirth than women aging more than twenty are

(UNFPA, 2004). Whereas, girls between the age group of fifteen to nineteen years are twice as likely to die from pregnancy or childbirth compared to older women (Save the Children, 2004).

The high maternal mortality rate is just the one side of the coin, the other side is the infant mortality rate and health risks of the child. An infant born to a teen mother is as twice as likely to have birth related health defects, e.g. low birth weight, premature birth and higher infant mortality rates, as compared to older mothers (Save the Children, 2004). In addition, a child born to a young mother is twice likely to die within one year of birth than a child born to older women (Jain & Kurz, 2007). Children of teen mothers are at higher risk to become victims of child abuse and neglect, engage in criminal activity and have academic and behavioral problems in school (Goerge & Lee 1997; Overpeck et al. 1998; Hotz, McElroy, and Sanders 1997; Hunt 2003).

### *2.3.2 Early Marriages and Fertility*

Early marriage is often associated with high fertility rate, as it increases the span of women's reproductive period (Ababa, 2006). Due to consequences of early marriage such as lower education and economic dependency, women in a marriage do not have credibility and therefore, have fewer chances of spacing or avoiding unwanted pregnancy (Ababa, 2006). This leads to more responsibilities at an early age paired with economic struggles due to a larger family in the future.



### *2.3.3 Early Marriage and Education*

Education allows over all development of an individual and plays an important role in shaping one's personality. It is considered as a value in itself (Noureen & Awan, 2011). Early marriage has a strong association with the level of education of a woman because if they are educated they marry late and if not they marry early. Early marriages are considered a barrier to education, as the woman is expected to devote all her time to her husband and new family (Jensen & Thornton, 2003). Often girls are sent to school because, "something they do while they are waiting to get married" (Amin & Huq, 2008). As a result, girls are often forced to terminate schooling so they could be married (Save the Children, 2004) or when they get married.

As previously discussed early marriage has strong associations with early motherhood, this is the other major reason why girls who marry early have low education. Young women with a child are more likely to find motherhood as the sole focus of their lives (Singh, Susheela, Samra & Renee, 1996). A lower level of education does not allow women to study or work, which may result in increasing poverty, especially in developing countries as the members of the family are rapidly increasing and earning members of the family remains the same. Thus, early marriage and childbearing tends to reinforce poverty.

There have been several studies that prove education can empower women and give them the confidence to work. According to Noureen and Awan's study in Pakistan, education changes women life in numerous ways like, enhancing their confidence, raising their status in the family and society, bring awareness about their rights, boosting their self-esteem, increasing their self-efficacy, reducing their dependency, better upbringing of their children, enhancing their mobility and opening career opportunities (2011). Schooling allows girls to question traditional values as it exposes them to new ideas, attitudes and aspirations (Kritz & Gurak, 1989) and empower them.

Educated women are more likely to send their children to school compared to uneducated mothers (Mishra, 2005). According to Adetunde and Akensina (2008), "countries with similar gender gaps in education have better indicators of social welfare. For example, lower fertility rates, lower infant mortality rate, improved nutrition, increased life expectancy and better opportunities for their children in the next generation are social benefits that will arise if more females are provided with proper education".

#### *2.3.4 Early Marriage and Poverty*

The association between early marriage and poverty has widely been studied. As discussed above, early marriages mostly result in school dropouts; this does not allow girls to get well-paid jobs that are to say even if they get an

opportunity to work at all. Various research has found that women who get married before the age of nineteen, they are 50% more likely to drop out from school (U.S. Census, 1986; Klepinger, Lundberg, and Plotnick 1999; Ribar, 1994). Dahl (2010) explains that there is significant amount of literature demonstrating the negative consequences resulting from low education level, e.g. unemployment, low wages, higher rates of crime and poor health. Dahl (2010) finds in his study that women who marry young are more likely to end up impoverished. He further concludes, “legal restrictions that prevent early marriages and mandate high school completion have the potential to greatly reduce the chances of future poverty for a woman and her family. The implication is that legal restrictions on teenagers’ choices can reduce external costs imposed on society, and it is possible they also prevent some teens from making decisions they will later regret” (Dahl, 2010).

### *2.3.5 Early Marriage and Violence*

With marriage come many responsibilities that often led to marital conflict. Studies have proved that young girls who marry early often lack the power and status in their marriage; this increases their chances of becoming a victim of domestic violence and sexual abuse (Jain & Kurz, 2007). A study in Egypt found that 29% of adolescent married girls have been victims of physical abuse and of these, 49% have been beaten during pregnancy (Bruce & Judith,

2000). Another study found that 26% of domestic violence cases in Jordan were against married girls under 18 (Rubeihat & Sabri, 1994).

Many times girls in fear of getting married early run away from their homes. Often times if a young girl do not agree to marry, she might be brutally beaten or even killed, and such acts are referred to as “Honor Killing”. Honor killing is common in countries such as Bangladesh, Egypt, Jordan, Lebanon, Pakistan, Turkey etc. (UNICEF 2000).

Physical and sexual violence can often lead to divorce or separation. A study in Java concluded that, “girls who marry early are three times more likely to be divorced than those married later” (Savitridina & Rini, 1997). A similar study in Calcutta found that “sexual violence in marriage is associated with a greater likelihood of separation than physical violence alone” (Outtara, Sen, & Thornson, 1998).

Jenson and Thornton found that women who justify violence are more like to be married young (2003). A study concluded in Kenya, found that among girls who are married before the age of 18, 36% believe that it is justified for men to beat their wives (UNICEF, 2005). It has been seen, that the age of partners during the marriage is strongly associated with divorce and separation (Moore & Waite, 1981). According to Moore and Waite, if the partner is younger than 19, it increases the chances of separation or divorce for women (1981).

### 2.3.6 *HIV/AIDS*

There have been numerous studies relating early/teenage marriage to the infection of HIV/AIDS. Adolescent women have been determined to be at higher risk of contracting HIV, research in Kenya, Zambia and Cameroon have proved that married teenage girls are more likely to be HIV-positive than unmarried (Clark, 2004; Glynn et al., 2001; Lydie et al., 2001). Adair (2007) suggests that due to early sexual intercourse initiation and its higher frequency with husbands who are older in age and HIV positive. In addition, these young married women are less likely to use condom due to lack of power in marriage (Bruce and Clark, 2003; Clark, 2004; Clark et al., 2006).

One of the other important factors is that, when young girls marry older men, there are higher chances that the men have had multiple partners previously. A study in Uganda found that HIV infection risks double if the difference in age between husband and wife is 10 or more years (Bolan, Ehrhardt & Wassesheit, 1999). Another study in Zimbabwe found similar results, concluding, with the age difference by every year increases the risk of HIV (Kiragu, 2001).

According to WHO (2005), "By the end of 2005, women have accounted for nearly half of all people living with AIDS worldwide, and represent almost 60% of infections in sub-Saharan Africa. Moreover, young women are several times more likely than young men to contract the disease through heterosexual contact. Worldwide, 62% of infected young people are girls, and that number

soars to 77% in sub-Saharan Africa. A woman's vulnerability to the virus is attributable not only to biological differences, but also to deeply entrenched socio-economic inequalities that further compound her risk”.

Adair (2007) studied the relationship of age at marriage and HIV/AIDS in the sub-Saharan region using the Cameron Demographic and Health Surveys (CDHS) data of 2004. His analysis of CDHS found some very interesting results. It found that women living in urban areas were more likely to be HIV positive as compared to the rural population. He argument is that women living in urban areas marry late and therefore have multiple partners that contribute to their higher risk of HIV (Adair, 2007).

#### *2.3.7 Early marriage and use of contraceptives*

The awareness of use of contraceptives in developing countries is a key factor for social and economic progress of not only the family involved but also society and country as a whole. Various studies indicate a direct and indirect effect of age of marriage of the women on the use of contraceptives. Santhya et al. (2010) examined 8,314 married women between the ages range of twenty and twenty-four living in five different states of India. The data obtained was used to study the effect of early marriage, in this instance before the age of 18, which is the legal age in India, on marital, reproductive and other health issues faced (Santhya et.al, 2010). The girls married at early age were less likely to use

contraceptives to delay first pregnancy unlike their counterpart (3% vs. 11%). This can be considered as a reflection of strong pressure on young women to prove their fertility after marriage.

A similar study conducted by Raj et al. measured the effect of child marriage on fertility and fertility-control outcomes in India (Santhya et al. 2010). The sample was again women between the ages of twenty and twenty-four in India. The results strongly demonstrate that the use of contraceptive before first childbirth was highly unlikely. 77.2% of women who had child marriages reported of not using contraceptive before first pregnancy. These studies are also supported by similar findings from other developing nations published by UNICEF.

#### *2.3.8 Gender-Role Attitudes*

Gender role attitudes have a complex as well as reciprocal relation with marriage. It is likely that the gender role attitudes in early adult age strongly influence the decisions regarding marriage and family, and similarly, the effect of marriage at an early age and experiences associated with it affect the development of gender role attitudes amongst women. A study conducted by Barber and Axinn (1998), the effect of gender role attitudes on early marriage as well as effect of age of marriage on gender role attitudes have been studied. It was found that, the

women who have a belief that role of women are best suited as a house maker is married at a young age (Barber & Axinn, 1998).

However, women who get married earlier have a tendency of believing that wives should only be homemakers. The level of autonomous decision-making and self-efficacy are also affected by the age of marriage of a girl. In a study by Santhya, Ram, Acharya, Jejeebhoy, Ram, and Singh (2010), they observed that only 67% of women who married at an early age were involved in all decision – making domains of the family as compared to 72 % of their counterpart. In addition, self-confidence in expressing their opinions was much less in women married at an early age than those married at a later age.

As seen from various literatures, numbers of social, economic, mental, physical as well as physiological problems are associated with early marriage age of women. The practice of child marriage is very much common all over the world, particularly in developing countries. Various causes of child marriage include religious beliefs, lack of education, prevalent myths and misconceptions, social status as perceived by older members of the family and even considering the girl child as a burden to be gotten rid of as soon as possible.

On the other hand the negative effects this practice has on the girl child's health, education, gender role attitudes and reproductive and psychological health are evident. The amount of development occurring throughout the world is incredible. Even in Yemen and other Arab countries, modernization and



urbanization are a continuously increasing process since the past decade. Is this development limited to constructions and economy of the nation or it has its effect on the socio cultural scene in the country? This is an important question to be answered because not civilization, culture or country can progress without over all socio-economic development. It is a very old saying in Hindu scriptures that a measure of cultures progress is the way it treats its women.

Child marriage is definitely not a practice to be followed not only for the betterment of the life of that girl but also for the development of society as a whole. It will be interesting to discover complex relation between urbanization, level of education and age of marriage of women in this emerging Arab nation of The Republic of Yemen. It will not only provide a measure of the effect of progress on women in the Muslim world but also open doors for further research, reforms and development.

## CHAPTER 3

### THEORY

#### 3.1 Ecosystem Theory

As Germain and Gitterman describe, “the ecological perspective makes clear the need to view people and environments as a unitary system within a particular cultural and historic context. Both person and environment can be fully understood only in terms of their relationship, in which each continually influences the other within a particular context” (1995, p. 816). Similarly, in order to understand the urban/rural differences of age at marriage among Yemeni women, it is important to understand the concept of person in environment.

Anwar in his book *Gender and Self in Islam*, states that the gender system depends highly on the blend of local beliefs, norms, laws practices and global forces within Muslim societies (2006). He further adds, “Muslim’s different degrees of encounters with both local and global forces have produced, nurtured and perpetuated the contradictory claims of gender systems” (Anwar, 2006). Therefore, the urban-rural differences of age at marriage have direct relation to the place of residency.

The amount of modernization influence in the area of residency affects,

the perceived “normal” age at marriage for women. Women living in urban areas are exposed to modern values that support postponement of marriage age (Singh, Susheela, Samara, Renee, 1996). Urbanization also gives women the opportunity to that away from community and kingship based social controls that allow them to have control of their sexual behavior and partner selection. Therefore, these attributes of urban residency lead to fewer chances of urban women marrying at a young age (Singh, Susheela, Samara, Renee, 1996).

The interpretation of one’s faith and religious laws has also an impact of what is perceived as morally acceptable. The domination of Islam as a religion in Yemen has both served as a coping strategy and impediment to gender equality rights for Yemen women. These differences are on the basis of their interpretation of the Koran (Bartelink & Buitelaar, 2006. p. 357). In Bartelink & Buitelaar’s study, they found during their interviews, women undergoing abuse and distress often found strength and hope in the means of prayers and their belief in God (2006 p. 357). Further in their interviews, they came across a middle class woman, who claimed her right to practice birth-control on the basis of her Koran’s interpretations. Whereas, on the other hand, they found two middle class educated and independent women teachers, supporting strict sex- segregation and condemning the use of contraceptives on the basis of their interpretation of the Koran (2006 p. 357). These differences in interpretation of the religion and its law are based on the environment i.e. life experience and individual interpretations

of these experiences. Such interpretations are also likely to emerge because of unique outcomes resulting from interactions with the physical environment. Therefore, the place of residency i.e. urban-rural has strong effect on one's perception of what is considered normal and what is not.

One of the other important factors that influence age at marriage is the educational attainment of women. Singh, Susheela, Samara & Renee (1996) study of forty developing countries including Yemen states, "In every country, women with at least some secondary schooling are less likely to have married at a young age than are women with less education" (1996). Education contributes to the postponement of marriage due to the presences of various alternatives options that are available for women (Sunil & Pillai, 2004).

Education makes women aware of the harmful effect of early marriages and its impact on society as a whole. It gives women more credibility in marriage, independence, and confidence. This allows them to advocate for themselves when injustice occurs and participate in their life decisions. YDMCHS (1997), states, "The educational level of household members is an important characteristic because educational attainment affects many areas including reproductive behavior, proper hygienic practices, health of children and the status of women". Balakrishnan in his studies on women in Mexico, Costa Rica , Columbia and Peru found that women with higher levels of education are less likely to be married at a younger age (1976). Furthermore, women with secondary educations

are less likely to marry early; in fact, countries where the major portion of women acquire minimum of secondary education have lower rates of adolescent marriages (Singh, Susheela, Samra & Renee, 1996).

Regions have an indirect effect on the age at which a girl gets married. The regions such as mountains and deserts are where hardships are faced by its people on daily basis and thus less urbanized. On the other hand, regions such as Plateau and Coastal Plains have much to offer in terms of economic opportunities to develop, and hence, see a much higher rate of urbanization and development than their counter part.

In Yemen, the desert regions is mainly inhabited mostly by nomads and this effects the cultural and conservative religious beliefs they hold. These factors indirectly affect the age at which girls are married in those regions and hence regions will be considered as a control variable. Not many studies have been conducted relating demographic regions to the age of marriage or any other women oriented social issues. A. Rogers emphasizes the combine effect of economic growth and demographics on urbanization (1982). He vividly describes how demographic regions with more resources like coastal line, have to offer for economic growth and inherently urbanization in that region. This further relates to various social factors affecting the perspective of a society towards age at which a girl should get married.

### 3.2 Hypothesis

1. Women living in Urban areas in Yemen will marry later then compared to women living in rural areas in Yemen
2. Women with higher education will marry later than compared to women with lower educational status

## CHAPTER 4

### DATA AND METHODOLOGY

#### 4.1 Yemen Demographic and Maternal and Child Health Survey

The data used for this study is from the Yemen Demographic, Maternal, and Child Health Surveys of 1997(YDMCHS). The YDMCHS 1997 survey was carried out by the Central Statistical Organization with the help of ministry of planning and development, the Ministry of Public Health, the National Council for Population and Macro International Inc. (YDMCHS, 1997). The objective of this survey was to:

- (1) Provide useful and reliable data to policymakers, decision makers, researchers and scholars
- (2) Update and analyze demographic data and the factors affecting the level and trends of fertility
- (3) Measure level contraceptive knowledge on the bases of rural and urban residency
- (4) Collect family health data and measuring nutritional status of mothers and their children and maternal mortality rate

(5) Develop necessary skills and resources for conducting such surveys (YDMCHS, 1997).

The total sample consisted of 10,414 women who had ever married in the age group of 15 to 49 (YDMCHS, 1997). The survey included two sets of questionnaires, a household questionnaire and an individual questionnaire. The former included age, sex, marital status, educational level, work status, fertility and mortality and housing characteristics. Whereas, the latter were for all married women aged fifteen to forty nine years, the questionnaire included: Respondent's background, reproduction, family planning, pregnancy and breastfeeding, immunization and health, birth preferences, marriage and husband's background, maternal mortality, female circumcision and weight (YDMCHS, 1997).

## 4.2 Variables

### *4.2.1 Independent Variables*

There are two independent variables for this study. The first is place of residency. This study will measure the effect of place of residency on women's age at marriage in Yemen. The place of residency will be measured in terms of urban-rural living. For the purposes of this study, urban areas are considered to be city or town, whereas rural will be people living in the country. The data taken



from YDMCHS (1997) includes all governorates at the urban and rural levels. For the purposes of the study, three variables will be created:

1. Urban: The value for this variable will be 1 and for rest will be 0
2. Rural: The value for this variable will be 0, the reference group

The second independent variable in this study is women's level of education. The study will measure the effect of level of education of women on the age at marriage. According to International Center for Research on Women, women with higher level of education are less likely to be marrying as a child or teenager. The level of education thus has a critical influence on age at marriage. Education is measured at the ordinal level.

#### *4.2.2 Interaction Variable*

Interaction variable will study the effect of interaction between the place of residency and level of education on age at marriage.

#### *4.2.3 Dependent Variable*

Age at marriage is the dependent variable of this study. It is measured at the interval level in years.

#### *4.2.4 Control Variable*

Regions is the control variable in the study. Yemen has four major regions, mountainous, coastal, plateau and desert. Apart from that, there are 112 islands in the waters of the Red Sea and the Arabian Sea. The effect of urban-rural

residency and level of education on age at marriage will be evaluated controlling for the effect of region. The governorates are distributed into four major regions. Table 1 shows the distribution.

The following control variables are operationalized as follows:

1. 'Mountain': Those who live in mountain regions will be coded 1
2. 'Coastal': Those who live in coastal regions will be coded 2
3. 'Highland': Those who live in plateau regions will be coded 3
4. 'Desert': Those who live in desert regions will be coded 4
5. 'Reference': This will be the governorates that are combination of two or more regions will be coded 0.

#### 4.3 Data Analysis Method

Multiple regression analysis will be used for the purpose of analyzing the effect of two independent variables i.e. urban-rural residency and level of education on the dependent variable age at marriage. Regression analysis is one of them most common methods to analyze effect of multiple independent variables on a dependent variable. Statistical Package for the social sciences (SPSS) will be used to conduct multiple regression analysis.

Table 4.1 Distribution of Governarates

<b>Number</b>	<b>Governarates</b>	<b>Regions</b>
1.	Amran	Mountain
2.	Ad Dali'	Mountain
3.	Al Bayda'	Mountain
4.	Al Hudaydah	CoastalPlains
5.	Al Jawf	West Mountain + North Desert <b>(Reference Group)</b>
6.	Al Mahwit	Mountain
7.	Amanat Al Asimah	Mountain
8.	Dhamar	Mountain
9.	Hajjah	Mountain
10.	Ibb	Mountain
11.	Ma'rib	West Mountain + North East Desert <b>(Reference Group)</b>
12.	Raymah	Mountain
13.	Sa'dah	Mountain
14.	Sana'a	Mountain
15.	Ta'izz	Mountain
16.	Adan	Coastal Plains

Table 4.1 Distribution of Governaraters (Contd.)

17.	Abyan	South Coastal+ North EastHighland+ North WestMountains <b>(Reference Group)</b>
18.	Al Mahrah	Highland
19.	Hadramaut	Desert
20.	Lahij	North Mountain + South Coastal Plains <b>(Reference Group)</b>
21.	Shabwah	West Mountain+ EastHighland + SouthCoastal Plains <b>(Reference Group)</b>

## CHAPTER 5

### RESULTS AND ANALYSIS

#### 5.1 Frequency Distribution

This study analyzed effects of place of residency (Urban and Rural) and level of education on women's age at marriage in Yemen. The unit of analysis in this study was women in the age group fifteen to forty nine. For the purpose of finding the results and evaluating the hypothesis, SPSS was used. For all the variables, i.e. the place of residency, level of education, age at marriage and region, frequency distribution was calculated using SPSS.

For the independent and control variable, frequency distributions were obtained. The majority of sample population of the total 10414, 71.7 % accounted to be currently living in rural Yemen. 78.9% of the sample population was not educated, 12.4% had completed their primary education, 7.5% had completed secondary education and 1.1% completed their higher education. The frequency distribution of control variable region showed that 57% population lived in mountainous region, 9.2% in coastal region, 4.9% in highlands, 4.6% in desert and 24.2% in others. See Table 5.1, Table 5.2 and Table 5.3.

Table 5.1 Place of Residency

	Frequency	Percent	Valid Percent	Cumulative Percent
Urban	2945	28.3	28.3	28.3
Valid Rural	7469	71.7	71.7	100.0
Total	10414	100.0	100.0	

Table 5.2 Level of Education

	Frequency	Percent	Valid Percent	Cumulative Percent
No education	8220	78.9	78.9	78.9
Valid Primary	1293	12.4	12.4	91.3
Secondary	783	7.5	7.5	98.9
Higher	118	1.1	1.1	100.0
Total	10414	100.0	100.0	

Table 5.3 Region

	Frequency	Percent	Valid Percent	Cumulative Percent
Rest	2523	24.2	24.2	24.2
Mountain	5940	57.0	57.0	81.3
Coastal	959	9.2	9.2	90.5
Highland	509	4.9	4.9	95.4
Desert	483	4.6	4.6	100.0
Total	10414	100.0	100.0	

For dependent variable, age at marriage, mean, median, mode and standard deviation is calculated using SPSS. The mean age at marriage is found to be 16.24 years whereas, median was 16 years, mode was 15 and the standard deviation was 3.207. A histogram was drawn based on the frequency distribution of age at marriage among the population. See Table 5.4 and Graph 5.1.

Table 5.4 The Mean, Median, Mode and Standard Deviation

	Valid	10414
N	Missing	0
	Mean	16.24
	Median	16.00
	Mode	15
	Std. Deviation	3.207

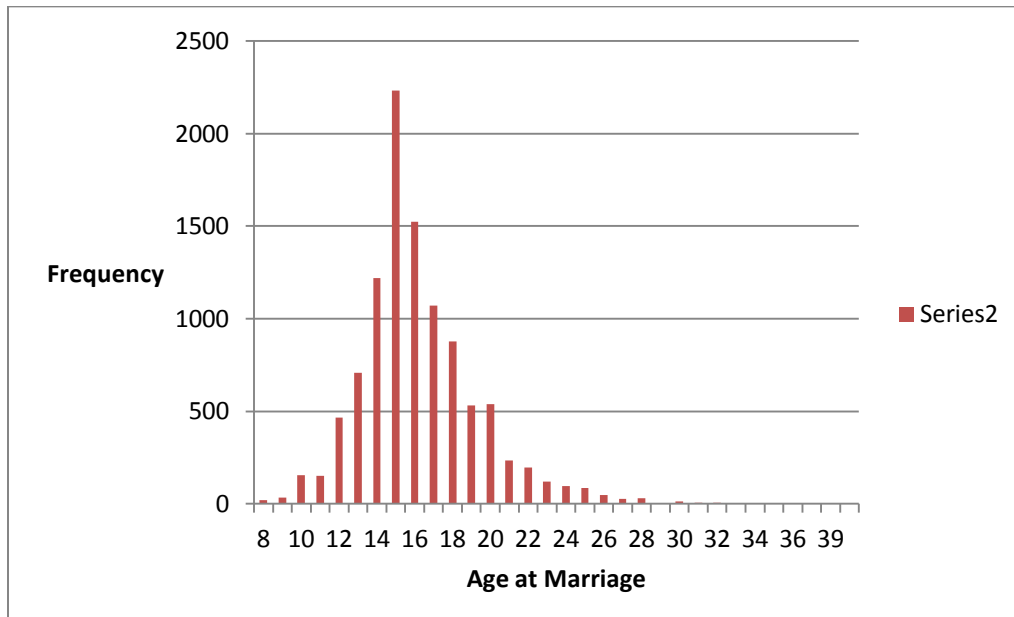


Figure 5.1 Age at Marriage



## 5.2 Correlation and T-Test

To find correlation between level of education and age at marriage, bivariate correlation was used. A slight positive relationship was found with correlation of .263 significant at the .05 level. See Table 5.5

Table 5.5 Correlation between levels of education and age at marriage

<b>Correlations</b>			
		Age at first marriage	Highest educational level
Age at first marriage	Pearson Correlation	1	.263**
	Sig. (2-tailed)		.000
	N	10414	10414
Highest educational level	Pearson Correlation	.263**	1
	Sig. (2-tailed)	.000	
	N	10414	10414
**. Correlation is significant at the 0.01 level (2-tailed)			

T-test was conducted to compare the means of age at marriage among the urban and rural population. There was significant difference found between the mean age at marriage in urban and rural area. See table 5.6.

Table 5.6 T-Test for place of residency and age at marriage

<b>Independent Samples Test</b>										
		Levene's Test for Equality of Variances		t-test for Equality of Means						
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	95% Confidence Interval of the Difference	
									Lower	Upper
Age at first marriage	Equal variances assumed	233.026	.000	8.594	10412	.000	.598	.070	.461	.734
	Equal variances not assumed			7.710	4408.245	.000	.598	.078	.446	.750

### 5.3 Regression Analysis

Allen (2004), states, “regression analysis is a statistical technique that attempts to predict the values of one variable using values of one or more other variables”, further adding that, “ it allows us to assess how accurately an independent variable predicts a dependent variable. Regression analysis allows us to examine simultaneously both the form of a relationship and the accuracy of a relationship. Last but not least, regression analysis can also tell us whether or not a particular relationship is statistically significant” (pg. 3)

In this study, regression analysis was used to study the effect of urbanization and level of education on women’s age at marriage. SPSS was used to study the form and accuracy of this relationship and its significance. First, a regression analysis was done to assess the statistical significance of the two independent variables, type of residency and level of education. The result found that level of education was significant at .000 levels, with a slope of .268. The slope of Place of residency is .015, not significant at the .05 level. See Table 5.7

Table 5.7 Regression Analysis of place of residency and level of education as and age at marriage

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
(Constant)	15.653	.134		116.647	.000
1 Type of place of residence	.104	.072	.015	1.437	.151
Highest educational level	1.309	.050	.268	26.376	.000

Second, regression analysis was done with same independent and dependent with an addition of third variable interaction, “inter”. This variable was created to study the interaction of level of education and place of residency. Interaction variable was found to be significant at .05 levels with a slope of -.059. The level of education remained significant with .000 levels. However, place of residency was now significant with .043 level. See Table 5.8.

Table 5.8 Regression Analysis of place of residency and level of education as, age at marriage and interaction variable

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
(Constant)	15.565	.135		114.875	.000
1 Type of place of residence	.147	.073	.021	2.021	.043
Highest educational level	1.520	.068	.311	22.313	.000
inter	-.529	.117	-.059	-4.517	.000
a. Dependent Variable: Age at first marriage					

Third, regression analysis was conducted with the addition of region as a control variable. Level of education, place of residency and interaction remained significant at .05 levels. The level of education has a positive slope of .312 significant at the .05 level. See Table 5.9

Table 5.9 Regression of Age at Marriage on place of residency, level of education, interaction of level of education and place of residence, and region

coefficients					
Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.
	B	Std. Error	Beta		
(Constant)	15.596	.139		112.055	.000
Type of place of residence	.148	.073	.021	2.034	.042
Highest educational level	1.522	.068	.312	22.332	.000
inter	-.532	.117	-.060	-4.537	.000
region	-.030	.031	-.009	-.975	.329

The regression analysis suggests that there is a slight positive relationship between level of education and age at marriage. This meaning, with an increase in level of education there will be increase in an individual's age at marriage. This suggests that education is a significant indicator of age at marriage.

Regression analysis results of level of education as independent variable and age at marriage as dependent variable found a significant relationship between the variables. Thus supporting hypothesis # 2, women with higher education will marry later than compared to women with lower education. Whereas, there was no significance found between place of residency and age at marriage.

Further, an interaction variable was added to study the interaction effect independent variable on age at marriage. The results found that there was negative effect on age at marriage at a significant level. Meaning, a woman living in a rural area with a higher education will marry later then compared to a woman living in an urban area with a higher education.

Lastly, region as a control variable was added to the existing variables in the regression analysis. The addition of the control variable did not alter the effect of the rest of the variables in the model.

## CHAPTER 6

### DISCUSSION AND CONCLUSION

#### 6.1 Discussion

Women's oppression and gender inequality have become predominant concerns of our times with the emergence of concepts such as social justice and human rights. Even after years of intervention, we still find ourselves in the midst of the same struggle. This study was conducted to better comprehend the effects of changing society on women's life. By studying the effects on urbanization and level of education on women's age at marriage, we try to test the efficiency of our current social construction. This will further help in forming new programs and policies that could help in the process of woman's empowerment in Yemen.

United Nations development program defines empowerment as, "The expansion of men and women's capabilities and choices increases their ability to exercise those choices free of hunger, want and deprivation. It also increases their opportunity to participate in, or endorse, decision-making affecting their lives". Therefore, empowering women will increase their credibility and opportunity to build their career in various fields, and give them economic independence.



The effect of place of residency i.e. rural vs. urban on women age at marriage was not found significant. Living in urban areas had no effect on women's age at marriage. A similar study by Balakrishnan (1976) based on four Latin American countries, found a weak effect of urbanization on age at marriage. Balakrishnan (1976) states, "The differences in mean ages at marriage were lower but in expected direction for early childhood socialization and rural-urban type of present place of residency".

However, the results of this study can be attributed to the presence of strict Islamic culture in the country. Yemen is a Middle Eastern, Islamic country with social and legal norms based on Islamic laws. This makes it difficult for even the people who live in urban areas to ignore social practices like early marriage. In addition, majority of the population in Yemen still lives in rural areas making the urban population a minority. This creates the fear of being socially rejected or isolated, hence pressurizing individuals and families to follow social and cultural norms in spite of the contradicting beliefs. This could be the underlying cause of the results.

Hypothesis two results indicate a positive effect of education on women's age at marriage. This means, women who have higher education are more likely to marry at a later age. This further allows us to conclude that education empowers women to a degree that they are in a position to make their own life

decision or at least has a say in it. Education provides women with many competitive options to marriage, hence delaying it (Sunil & Pillai, 2010).

These results can be tied with empowerment theory, i.e. more than urbanization, education is empowering individuals, especially women to postpone their marriage. It is observed, that women who acquire education, prefer to be more independent and have more decision making power in households. Studies have found education an integral part of the process of empowerment. Education is not only limited to empowerment of women, but also other suppressed groups like poverty.

Tori (2011) states, “the development of women is a combination of changes in their personal and public life at socio-economic and cultural levels. It is important to emphasize that the results of this form of development intervention are not just limited to economic consideration but also entail some important social aspects. These aspects pertain to the enhancement of women's training and education, the increase of awareness among women about gender inequalities, the strengthening of local women's organizations and their networking capacities at different levels. The development of leadership skills amongst women and the increased access to decision-making processes have been other important outcomes”.

## 6.2 Limitation and Future Studies

Though the study found a positive relationship between education and age at marriage, there are limitations to the study as well. The data analyzed for this study was from Yemen Demographic and maternal and Child Health Survey of year 1997. As previously, mentioned Yemen is an Islamic country and in the year 1997 when this survey was taken, the country was under the rule of President Ali Abdullah Saleh since 1978. This could have a major impact on the responses of the participant. In 1997, the exposure to modern values in Yemen was very limited, even in urban area. The strict laws and policies of the country allowed a very small window of opportunity for people to express their opinions. However, in the past year, Yemen underwent a revolution, citizens finally voiced against their President and demanded employment and economic growth. This reflects the changing ideology of Yemenis. Therefore, I propose a new study that based on current data.

In spite of the limitations, the study has great potential for future research. First, the education variable can be tested with other social trends in Yemen, for example, level of economic independence, domestic violence and gender-role attitudes. Secondly, the studies could also replicate the present study in other countries especially in Islamic countries. If the majority of Islamic countries show similar relationship between education and age at marriage, this may become the basis of major social reforms and policies.

### 6.3 Social Work Implications

The International Association of School of Social Work (IASSW) defines social work as being, “The social work profession promotes social change, problem solving in human relationships and the empowerment and liberation of people to enhance well-being. Utilizing theories of human behavior and social systems, social work intervenes at the points where people interact with their environments. Principles of human rights and social justice are fundamental to social work” (2004).

Today, with the continuous budget cuts in social service agencies, a great emphasis is put on evidence-based practice. As the name suggest, evidence-based practice is clinical practice based on best research evidence. This saves money and time of both patients and the social workers. Though, this study does not test any clinical practices or model, it does show a relationship between two important variables that are essential components of programs and policies for improving age at marriage through a program of empowerment.

This study contributes to the large research collection that forms the basis of many existing programs and policies of local and international organizations. This study could be used by women empowerment organizations with programs based on promoting education. This may help them to either retain or apply for funding. As it provides them with the evidence that their current programs are research based and are contributing to women’s status in such societies.

The result of this study also gives direction to many women empowerment agencies. This study finds education as an essential part of women's age at marriage in one of the most conservative societies. These findings can play a major role in initiating a program in Yemen that promotes women's education. In addition to this, the social activist can also use this research in their negotiations with the government.

For the past year, Yemen is going through a revolution; such studies can be very beneficial for the government and Yemenis to follow the direction of education in order to sustain their society. As it was clear from the literature review, early marriage has repercussions such as, early motherhood, inadequate education, poverty, domestic violence, higher chances of HIV/AIDs, use of contraceptives and gender-role attitudes. Therefore, by avoiding early marriages many social issues could be brought under control.

Finally, this research provides the basis for further research in similar fields. This study could be replicated or broadened for better results and understanding of these variables.

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