## REPUBLIC OF TURKEY HACETTEPE UNIVERSITY INSTITUTE OF HEALTH SCIENCES

# PREVALENCE OF FAMILY PLANNING METHODS AMONG MARRIED WOMEN AGED 15-49 YEARS IN ONE RURAL AREA NADERSHA KOT DISTRICT OF KHOST PROVINCE OF AFGHANISTAN

Dr. Tajmalook SAMIM

EPIDEMIOLOGY PROGRAM MASTER OF SCIENCE THESIS

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## **COMMITTEE APPROVAL PAGE**

Department	:	Epidemiology
Program	:	Epidemiology-Master of Science
Thesis Title	:	Prevalence of family planning methods among married
		women aged 15-49 years in one rural area Nadersha Kot
		'District'- Khost Province-Afghanistan
Name of the Student	:	Taj Malook SAMIM
Date of the Defense	:	14/11/2014

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	1245
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This thesis has been approved by the committee above in conformity of the regulations and by laws of Hacettepe University Graduate Programs and has been accepted by the Board of Directors of the Institutes of Health Sciences.

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### ABSTRACT

Tajmalook Samim. Prevalence of family planning method among married women aged 15-49 years in one rural area Nadersha Kot District of Khost Province of Afghanistan, Master thesis Ankara September-2014. The objectives of this study were to determine the level of women's knowledge on family planning, the prevalence of family planning method use and to determine the related factors among married women aged 15 to 49 years in Nadersha Kot District in Khost Province of Afghanistan. In this cross-sectional study, the data was collected via a pre-tested structured questionnaire which was conducted to 885 women through household visits and based on face to face interview. Data was entered and analyzed by using SPSS version 15.0. Descriptive Statistics Chi-square test and binary logistic regression analysis were performed. A p-value <0.05 was considered as the level of significance. The mean age of women was 31.1±6.6 years while mean age of husbands was 33.4±7.1. The literacy rate of women was 19.1% (husbands' was 37.4%). The mean number of living children was  $4.2\pm2.0$  (min-max=1-11) and the mean age at the first marriage was  $17.6 \pm 2.1$  years. It was found that more than twofifth (47.7%) of women had some knowledge of any contraceptive methods but current method use prevalence was only 21.0%. The most commonly used contraceptive method was oral pill among women who had ever-used any contraceptive method. Fear of side effects, difficulty of using, opposition of husband and intention to have child were the main reasons for discontinuing contraceptive use. Even almost half of the women living in rural area of Nadersha Kot District have some idea about level of contraceptive level. Age of woman and husband, educational level of woman and husband, age at first marriage, type of family, working status of woman and husband, self-evaluated economic status, and number of pregnancies were the common related factors for knowledge about family planning methods, ever use, current use of family planning methods and place of last delivery.

Key words: Reproductive health, Contraceptive, Methods, Women, Afghanistan

## ÖZET

Tajmalook, Samim. Bir kırsal alanda yaşayan 15-49 yaş evli kadınlarda aile planması yöntem kullanma prevalansı, Naderşa Kot Bölgesi, Khost İli, Afganistan. Hacettepe Üniversitesi Sağlık Bilimleri Enstitüsü Epidemiyoloji Programı Yüksek Lisans Tezi, Ankara 2014.

Bu çalışmanın amaçlari Afganistan'ın Khost İli Nadersha Kot bölgesinde yaşayan 15-49 yaş evli kadınların aile planlaması yöntemlerini bilme durumu ve aile planlaması yöntem kullanma prevalansını belirlemektir. Bu kesitsel çalışma, veriler evler ziyaret edilerek yüzyüze görüşme şeklinde uygulanan yeplandırılmış ve ön testi yapalmış bir anket formu aracılğı ile toplanmıştır. Verilerin bilgisayara girilmesi ve analizi SPSS 15, 0 programı kullanılarak yapılmıştır. Tanımlayıcı istatistikler, kikare testi ve binary regresyon analizler yapılmış, <0,05 düzeyinde p değeri anlamlı olarak kabul edilmiştir. Kadınların ortalama yaşı 31,1±66 eşlerinin 33,4±71' dir. Kadınlarda olur. Yazarlık düzeyi %19,1, eslerinde %37,4'tür. Ortalama yasayan çocuk sayısı 4,2  $\pm$ 2,0 (en küçük 1, en büyük 11), ortalama ilk evlenme yaşı 17,6 $\pm$ 2,1' dır. Kadınların beşte ikiden fazlasının(% 47,7) en az bir gebeliği önleyici yöntem bilmektedir. Simdiye dek vöntem kullanmış olan kadınlar arasında en çok kullanılan gebeliği önleyici yöntem yaptır (% 2,1',0). Yan etkilerden korkma, kullanmanın güç olması, eşin karşı çıkması ve çocuk isteme en temel yöntem kullanmama nedenleri olarak belirtilmştir. Nadersha kot bolgesi' nin kırsalında, kadınların yaklaşık yerısının herhangi bir koutraseptik yöntem bilmesine rağmen yöntem kullanım duzeyi çok düşüktür.

Anahtar sözcükler: Üreme sağlığı, Kontracepsiyon, yöntemler, Kadınlar, Afganistan.

## CONTENTS

		Page No
COMN	/IITTEE APPROVAL PAGE	i
ACKN	OWLEDGEMENT	iv
ABST	RACT	v
ÖZET		vi
CONT	ENTS	vii
SYMB	OLS AND ABREVIATIONS	Х
LIST (	OF FIGURES	xii
LIST (	OF TABLES	xiii
1. INT	RODUCTION	1
1.1. Oł	ojectives	12
2. GEN	JERAL KNOWLEDGE	13
2.1.	Reproductive health definition	13
2.2.	Background	13
2.3.	Family planning history	14
2.4.	The Traditional Role of Women: Early Views on Family planning	14
2.5.	The Women's Rights Movement of the 1960s	14
2.6.	Contraceptive methods use and Abortion	15
2.7.	Family planning methods use in girls aged 15-19 years	16
2.8.	Worldwide unintended pregnancy	17
2.9.	Contraceptive methods in unmarried women	18
2.10.	Contraceptive use in developing countries	18
2.11.	Contraceptive use by the view of Islam	19
2.12.	Countries supporting Family planning methods implementation	20
2.13.	Globally Population growth 1960-2050	20

		Page No
2.14.	Effective factors on FP use in developed, developing and under- developed countries and in Afghanistan.	21
3. ME	THODOLOGY	23
3.1.	Study area and population	23
3.2.	Study type	28
3.3.	Universe, sample and sample selection	28
3.4.	Data collection instrument	30
3.5.	Study variables	31
	3.5.1. Dependent variables	31
	3.5.2. Independent variables	31
3.6.	Ethical issues	32
3.7.	Data processing	32
3.8.	Study limitations	32
4. RES	SULST	33
4.1.	Some socio-demographic characteristics of women	33
4.2.	Some socio-demographic characteristics of husbands	37
4.3.	Reproductive history of women	39
4.4.	Some characteristics related to last pregnancy	41
4.5.	Women future intention to use contraceptive methods	53
4.6.	Knowledge and source of women about contraceptive method	60
4.7.	Family planning knowledge, ever and current use of contraceptive	73
4.8.	Making decision of the currently using contraceptive method	90
4.9.	Logistic regression analysis of the association some socio-demogra	phic
	characteristics and women knowledge, ever and current use of fami	ly
	planning methods and place of last delivery	
6. CC	ONCLUSSIONS	
7. RE	COMENDITIONS	
8. RE	EFERENCES	

ANNEXES

- Annex 1. Provinces and Districts of Afghanistan
- Annex 2. Survey form
- Annex 3. Name of villages of Nadersha Kot District
- Annex 4. Research Comittee Approvel leter

## SYMBOLS AND ABREVIATIONS

AIDS	Acquired Immunodeficiency Syndrome
AMC	Afghanistan multiple cluster survey
ANDS	Afghanistan National Development strategy
BCIIC	Birth control international information center
CDC	Central for diseases control and prevention
CHCs	Combined hormonal contraceptive
CI	Confidence interval
CIC	Combined injectable contraceptive
COCs	Combined oral contraceptive
CPR	Contraceptive prevalence
DHS	Demographic health survey
EECA	Eastern Europe and Central Asia
FHS	Foundation health system
GNI	Gross national income
GPE	Global partnership for education
HIV	Human immunodeficiency virus
ICPD	International conference on population and development
IUD	Intrauterine device
LAM	Lactation amenorrhea method
LBW	Low birth weight
MDGS	Millennium development goal
MICS	Multiple indicator cluster survey
MMR	Maternal mortality rate
MRRD	Ministry of Rural, Rehabilitation and Development
NGOs	Nongovernmental Organizations
NHS	National health survey
OR	Odd ratio
POPs	Progesterone only pill
RRP	Rapid repeat pregnancy
SPSS	Statistical Package for the Social Sciences

STDs	Sexually transmitted diseases
TFR	Total fertility rate
UK	United Kingdom
UN	United Nations
UNICCEF	United Nations International Children's Emergency Fund
US	United States America
USAID	United States Agency for International Development
WHO	World Health Organization
n	Number
%	Percent

## LIST OF FIGURES

		Page No
1.1.	Distribution of contraceptive prevalence in different	8
	countries, sub-regions and regions	
2.7.1.	Teenage pregnancy	16
2.7.2.	Percentage of all live births to mothers aged <20 and	17
	adolescent birth rate, by country 2009-2011	
3.1.1.	Map of Afghanistan	23
3.1.2.	Afghanistan population pyramid	24
3.1.3.	Map of Khost Province	26
3.1.4.	Map of Nadersha Kot District	27

## LIST OF TABLES

	Page	e No
1.1.	Distribution of contraceptive prevalence rate according to WHO in major six areas in the world	10
2.1.	Distribution of number of 9 millions of women aged 15-49 years in	19
	developing countries and those wanting to avoid pregnancy by	
	regional and sub-regional 2003, 2008 and 2012	
4.1.1.	Distribution of women by age (Nadersha Kot District-Afghanistan,	33
	2014)	
4.1.2.	Distribution of women by the level of education (Nadersha Kot	34
	District- Afghanistan, 2014)	
4.1.3.	Distribution of women by the number of marriages (Nadersha Kot	34
	District-Afghanistan, 2014)	
4.1.4.	Distribution of women by the age at marriage (Nadersha Kot District-	35
	Afghanistan, 2014)	
4.1.5.	Distribution of women by the type of family involved (Nadersha Kot	35
	District-Afghanistan, 2014)	
4.1.6.	Distribution of women by the number of household members	36
	(Nadersha Kot District- Afghanistan, 2014)	
4.1.7.	Distribution of women by working status (Nadersha Kot District-	36
	Afghanistan, 2014)	
4.1.8.	Distribution of women by self-evaluated economic status (Nadersha	36
	Kot District-Afghanistan, 2014)	
4.2.9.	Distribution of husbands by age (Nadersha Kot District-Afghanistan,	37
	2014)	
4.2.10.	Distribution of husbands by the level of education (Nadersha Kot	37
	District-Afghanistan, 2014)	
4.2.11.	Distribution of consanguinity with husband (Nadersha Kot District-	38
	Afghanistan, 2014)	
4.2.12.	Distribution of working status of husbands (Nadersha Kot District -	38
	Afghanistan, 2014)	

	Page	e No
4.13.	Distribution of women by having any chronic diseases status	38
	(Nadersha Kot District-Afghanistan, 2014)	
4.3.14.	Distribution of women by the number of pregnancies (Nadersha Kot	39
	District-Afghanistan, 2014)	
4.3.15.	Distribution of ever pregnant women by the number of living children	39
	(Nadersha Kot District-Afghanistan, 2014)	
4.3.16.	Distribution of women by the number of still birth (Nadersha Kot	40
	District-Afghanistan, 2014)	
4.3.17.	Distribution of women by the number of missed abortion (Nadersha	40
	Kot District-Afghanistan, 2014)	
4.3.18.	Distribution of women by the number of induced abortion (Nadersha	41
	Kot District-Afghanistan, 2014)	
4.4.19.	Distribution of women by the last pregnancy interval (Nadersha Kot	41
	District-Afghanistan, 2014)	
4.4.20.	Distribution of women by the place of last the delivery (Nadersha Kot	42
	District-Afghanistan, 2014)	
4.4.21.	Distribution of women by place of the last delivery and age (Nadersha	42
	Kot District-Afghanistan, 2014)	
4.4.22.	Distribution of women by place of the last delivery and level of	43
	education (Nadersha Kot District-Afghanistan, 2014)	
4.4.23.	Distribution of women by the place of the last delivery and age at first	43
	marriage (Nadersha Kot District-Afghanistan, 2014)	
4.4.24.	Distribution of women by the place of last delivery and type of family	44
	(Nadersha Kot District-Afghanistan, 2014)	
4.4.25.	Distribution of women by the place of the last delivery and working	44
	status (Nadersha Kot District-Afghanistan, 2014)	
4.4.26.	Distribution of women by the place of the last delivery and self-	45
	evaluated economical status (Nadersha Kot District-Afghanistan,	
	2014)	

Page No 4.4.27. Distribution of women by the place of the last delivery and husbands' 45 age (Nadersha Kot District-Afghanistan, 2014) 4.4.28. Distribution of women by the place of the last delivery and husbands' 46 level of education (Nadersha Kot District-Afghanistan, 2014) 4.4.29. Distribution of women by the place of the last delivery and husbands' 46 working status (Nadersha Kot District-Afghanistan, 2014) 4.4.30. Distribution of women by the place of the last delivery and number of 47 pregnancies (Nadersha Kot District-Afghanistan, 2014) 4.4.31. Distribution of women by the attendant during the last delivery and 47 age (Nadersha Kot District-Afghanistan, 2014) 4.4.32. Distribution of women by the attendant during the last delivery and 48 level of education (Nadersha Kot District-Afghanistan, 2014) 4.4.33. Distribution of women by the attendant during the last delivery and 48 age at first marriage (Nadersha Kot District-Afghanistan, 2014) 4.4.34. 49 Distribution of women by the attendant during the last delivery and type of family (Nadersha Kot District-Afghanistan, 2014) 49 4.4.35. Distribution of women by the attendant during the last delivery and working status (Nadersha Kot District-Afghanistan, 2014) 50 4.4.36. 4.4.36. Distribution of women by the attendant during the last delivery and self-evaluated economical status (Nadersha Kot District-Afghanistan, 2014) 4.4.37. Distribution of women by the attendant during the last delivery and 50 husbands' age (Nadersha Kot District-Afghanistan, 2014) 4.4.38. Distribution of women by the attendant during the last delivery and 51 husbands' level of education (Nadersha Kot District-Afghanistan, 2014) 4.4.39. Distribution of women by the attendant during the last delivery and 51 husbands' working status (Nadersha Kot District-Afghanistan, 2014) Distribution of women by the attendant during the last delivery and 52 4.4.40.

number of pregnancies (Nadersha Kot District-Afghanistan, 2014)

	Page	No
4.4.41.	Distribution of women by the birth attendant in the last delivery	52
	(Nadersha Kot District-Afghanistan, 2014)	
4.4.42.	Distribution of reason related to not giving birth at health facilities	53
	(Nadersha Kot District-Afghanistan, 2014)	
4.5.43.	Distribution of women by the preferred method in the future reason	53
	and method (Nadersha Kot District-Afghanistan, 2014)	
4.5.44.	Distribution of non-user by the intention to use contraceptive methods	54
	in the future (Nadersha Kot District-Afghanistan, 2014)	
4.5.45.	Distribution of women by the future intention to use contraceptive	55
	method and age (Nadersha Kot District -Afghanistan, 2014)	
4.5.46.	Distribution of women by the future intention to use contraceptive	55
	method and level of education (Nadersha Kot District-Af, 2014)	
4.5.47.	Distribution of women by the future intention to use contraceptive	56
	method and age at first marriage (Nadersha Kot District-Af, 2014)	
4.5.48.	Distribution of women by the future intention to use contraceptive	56
	method and type of family (Nadersha Kot District-Afghanistan, 2014)	
4.5.49.	Distribution of women by the future intention to use contraceptive	57
	method and working status (Nadersha Kot District-Af, 2014)	
4.5.50.	Distribution of women by the future intention to use contraceptive	57
	method and self-evaluated economical status (Nadersha Kot District-	
	Afghanistan, 2014)	
4.5.51.	Distribution of women by the future intention to use contraceptive	58
	method and husbands' age (Nadersha Kot District-Afghanistan, 2014)	
4.5.52.	Distribution of women by the future intention to use contraceptive	58
	method and husbands' level of education (Nadersha Kot District-	
	Afghanistan, 2014)	
4.5.53.	Distribution of women by the future intention to use contraceptive	59
	method and husbands' working status (Nadersha Kot District-	
	Afghanistan, 2014)	
4.5.54.	Distribution of women by the future intention to use contraceptive	59
	method and number of pregnancies (Nadersha Kot District- Af, 2014)	

	Page	e No
4.5.55.	Reasons for not using any family planning method (Nadersha Kot	60
	District-Afghanistan, 2014)	
4.6.56.	Distribution of source of knowledge by method (Nadersha Kot	60
	District-Afghanistan, 2014)	
4.6.57.	Distribution of women by the knowledge and ever use of family	61
	planning services offered in the residential area (Nadersha Kot	
	District-Afghanistan, 2014)	
4.6.58.	Distribution of women by age and knowledge about contraceptive	61
	methods (Nadersha Kot District-Afghanistan, 2014)	
4.6.59.	Distribution of women by knowledge about contraceptive methods	62
	and education level (Nadersha Kot District -Afghanistan, 2014)	
4.6.60.	Distribution of women by knowledge about contraceptive methods	62
	and age at first marriage (Nadersha Kot District-Afghanistan, 2014)	
4.6.61.	Distribution of women by knowledge about contraceptive methods	63
	and type of family (Nadersha Kot District-Afghanistan, 2014)	
4.6.62.	Distribution of women by knowledge about contraceptive methods	63
	and working status (Nadersha Kot District-Afghanistan, 2014	
4.6.63.	Distribution of women by knowledge about contraceptive methods	64
	and self-evaluated economical status (Nadersha Kot District-	
	Afghanistan, 2014)	
4.6.64.	Distribution of women by knowledge about contraceptive methods	64
	and husbands' age (Nadersha Kot District-Afghanistan, 2014)	
4.6.65.	Distribution of women by knowledge about contraceptive methods	65
	and husbands' level of education (Nadersha Kot District-Af, 2014)	
4.6.66.	Distribution of women by knowledge about contraceptive methods	65
	and husbands' working status (Nadersha Kot District-Afghanistan,	
	2014)	
4.6.67.	Distribution of women by knowledge about contraceptive methods	66
	and number of pregnancies Nadersha Kot District-Afghanistan, 2014)	

	Page	e No
4.6.68.	Distribution of women by knowledge about contraceptive method and	66
	place of last delivery (Nadersha Kot District- Afghanistan, 2014)	
4.6.69.	Distribution of women by knowledge about contraceptive methods	67
	and attendant of last delivery (Nadersha Kot District- Afghanistan,	
	2014)	
4.6.70.	Distribution of women by the Knowledge about family planning	67
	services in the residential area and age (Nadersha Kot District-	
	Afghanistan, 2014)	
4.6.71.	Distribution of women by the Knowledge about family planning	68
	services in the residential area and level of education (Nadersha Kot	
	District-Afghanistan, 2014)	
4.6.72.	Distribution of women by the Knowledge about family planning	68
	services in the residential area and age at first marriage (Nadersha Kot	
	District- Afghanistan, 2014)	
4.6.73.	Distribution of women by the Knowledge about family planning	69
	services in the residential area and type of family (Nadersha Kot	
	District- Afghanistan, 2014)	
4.6.74.	Distribution of women by the Knowledge about family planning	69
	services in the residential area and working status (Nadersha Kot	
	District- Afghanistan, 2014)	
4.6.75.	Distribution of women by the Knowledge about family planning	70
	services in the residential area and self-evaluated economical status	
	(Nadersha Kot District-Afghanistan, 2014)	
4.6.76.	Distribution of women by the Knowledge about family planning	70
	services in the residential area and husbands' age (Nadersha Kot	
	District- Afghanistan, 2014)	
4.6.77.	Distribution of women by the Knowledge about family planning	71
	services in the residential area and husbands' level of education	
	(Nadersha Kot District-Afghanistan, 2014)	

Page	e No
Distribution of women by the Knowledge about family planning	72
services in the residential area and husbands' working status	
(Nadersha Kot District-Afghanistan, 2014)	
Distribution of women by the Knowledge about family planning	72
services in the residential area and number of pregnancies (Nadersha	
Kot District-Afghanistan, 2014)	
4Distribution of women by knowledge ever use and current use of	73
modern contraceptive methods (Nadersha Kot District-Afghanistan,	
2014)	
Distribution of reasons using a contraceptive method by the type of	74
method (Nadersha Kot District-Afghanistan, 2014)	
Distribution of women by ever use of contraceptive methods and age	74
(Nadersha Kot District-Afghanistan, 2014)	
Distribution of women by ever use of contraceptive methods and	75
educational status (Nadersha Kot District-Afghanistan, 2014)	
Distribution of women by ever use of contraceptive methods and age	76
at first marriage (Nadersha Kot District-Afghanistan, 2014)	
Distribution of women by ever use of contraceptive methods and type	76
of family (Nadersha Kot District-Afghanistan, 2014)	
Distribution of women by ever use of contraceptive method and	77
working status (Nadersha Kot District-Afghanistan, 2014)	
Distribution of women by ever use of contraceptive methods and self-	77
evaluated economical status (Nadersha Kot District-Af, 2014)	
Distribution of women by ever use of contraceptive methods and	78
husbands' age (Nadersha Kot District-Afghanistan, 2014)	
Distribution of women by ever use of contraceptive methods and	78
husbands' educational status (Nadersha Kot District-Af, 2014)	
Distribution of women by ever use of contraceptive methods and	79
husbands' working status (Nadersha Kot District-Afghanistan, 2014)	
	PageDistribution of women by the Knowledge about family planning services in the residential area and husbands' working status(Nadersha Kot District-Afghanistan, 2014)Distribution of women by the Knowledge about family planning services in the residential area and number of pregnancies (Nadersha Kot District-Afghanistan, 2014)4Distribution of women by knowledge ever use and current use of modern contraceptive methods (Nadersha Kot District-Afghanistan, 2014)Distribution of reasons using a contraceptive method by the type of method (Nadersha Kot District-Afghanistan, 2014)Distribution of women by ever use of contraceptive methods and age (Nadersha Kot District-Afghanistan, 2014)Distribution of women by ever use of contraceptive methods and age (aucational status (Nadersha Kot District-Afghanistan, 2014)Distribution of women by ever use of contraceptive methods and type of family (Nadersha Kot District-Afghanistan, 2014)Distribution of women by ever use of contraceptive method and type of family (Nadersha Kot District-Afghanistan, 2014)Distribution of women by ever use of contraceptive methods and self of family (Nadersha Kot District-Afghanistan, 2014)Distribution of women by ever use of contraceptive methods and self outing status (Nadersha Kot District-Afghanistan, 2014)Distribution of women by ever use of contraceptive methods and self outing status (Nadersha Kot District-Afghanistan, 2014)Distribution of women by ever use of contraceptive methods and self outing status (Nadersha Kot District-Afghanistan, 2014)Distribution of women by ever use of contraceptive methods and use and self (Nabands' educational status (Nadersha Kot District-Afghanistan, 2014)Distribution of

4.7.91. Distribution of women by ever use of contraceptive methods and 79 number of pregnancies (Nadersha Kot District-Afghanistan, 2014) 4.7.92. Distribution of women by ever use of contraceptive methods and 80 place of last delivery (Nadersha Kot District- Afghanistan, 2014) 4.7.93. Distribution of women by ever use of contraceptive methods and 80 attendant of the delivery (Nadersha Kot District-Afghanistan, 2014) 4.7.94. Distribution of women by the willing to change the current method 81 and the reasons (Nadersha Kot District-Afghanistan, 2014) 4.7.95. Distribution of women by current use of contraceptive methods and 82 age (Nadersha Kot District-Afghanistan, 2014) 4.7.96. Distribution of women by current use of contraceptive methods and 82 level of education (Nadersha Kot District-Afghanistan, 2014) 4.7.97. 83 Distribution of women by current use of contraceptive methods and age at first marriage (Nadersha Kot District-Afghanistan, 2014) 4.7.98. Distribution of women by current use of contraceptive methods and 83 type of family (Nadersha Kot District-Afghanistan, 2014) 4.7.99. Distribution of women by current use of contraceptive methods and 84 working status (Nadersha Kot District-Afghanistan, 2014 4.7.100. Distribution of women by current use of contraceptive methods and 84 self-evaluated economical status (Nadersha Kot District-Af, 2014) 4.7.101. Distribution of women by current use about contraceptive method and 85 husbands' age group (Nadersha Kot District-Afghanistan, 2014) 4.7.102. Distribution of women by current use of contraceptive methods and 86 husbands' level of education (Nadersha Kot District-Af, 2014) 4.7.103. Distribution of women by current use of contraceptive methods and 86 husbands' working status (Nadersha Kot District-Afghanistan, 2014) 87 4.7.104. Distribution of women by current use of contraceptive methods and number of pregnancies (Nadersha Kot District-Afghanistan, 2014 Distribution of women by current use of contraceptive methods and 87 4.7.105. place of last delivery (Nadersha Kot District-Afghanistan, 2014).

Page No

Page No

- 4.7.106.Distribution of women by current use of contraceptive methods and88place of last delivery (Nadersha Kot District- Afghanistan, 2014).
- 4.7.107. Distribution of women by the persons who decided to the currentlyused method (Nadersha Kot District-Afghanistan, 2014)
- 4.7.108. Distribution of women by the person who decided to use the current 89 method and age (Nadersha Kot District-Afghanistan, 2014)
- 4.8.109. Distribution of women by the person who decided to use the current 90 method and level of education (Nadersha Kot District-Af, 2014)
- 4.8.110. Distribution of women by the person who decided to use the current 90 method and age at first marriage (Nadersha Kot District- Af, 2014)
- 4.8.111. Distribution of women by the person who decided to use the current 91 method and working status (Nadersha Kot District-Af, 2014)
- 4.8.112. Distribution of women by the person who decided to use the current 91 method and self-evaluated economical status (Nadersha Kot District-AfghanistanJan-2014)
- 4.8.113. Distribution of women by the person who decided to use the current 92 method and husbands' age group (Nadersha Kot District- Af, 2014)
- 4.8.114. Distribution of women by the person who decided to use the current 93 method and husbands' level of education (Nadersha Kot District-Afghanistan, 2014)
- 4.8.115. Distribution of women by the person who decided to use the current 93 method and husbands' working status (Nadersha Kot District-Afghanistan, 2014)
- 4.8.116. Distribution of women by the person who decided to use the current 94 method and number of pregnancies (Nadersha Kot District-Afghanistan, 2014)
- 4.9.117. Logistic Regression analysis of the association some sociodemographic characteristics and women knowledge any family planning method (Nadersha Kot District-Afghanistan, 2014)

	Page	e No
4.9.118.	Logistic Regression analysis of the association some socio-	96
	demographic characteristics and women ever use of any family	
	planning method (Nadersha Kot District-Afghanistan, 2014)	
4.9.119.	Logistic regression analysis of association of some socio demographic	98
	characteristics of women by the current use of any family planning	
	method (Nadersha Kot District-Afghanistan, 2014)	

4.9.120. Logistic regression analysis of the association of some Socio demographic characteristics of women and place of the last delivery
 (Nadersha Kot District-Afghanistan, 2014)

#### **1. INTRODUCTION**

There are several definitions of family planning. An expert committee (1971) of the WHO defined family planning as "a way of thinking and living that is adopted voluntarily, upon the basis of knowledge, attitude and responsible decisions by individuals and couples, in order to promote the health and the welfare of the family group and thus contribute effectively to the social development of a country" (1). In 1999, the Centers for Disease Control and Prevention (CDC) identified family planning as one of ten great public health achievements in the United States during the 20th century. Family planning is documented to prevent mother-child transmission of human immunodeficiency virus (HIV), contribute to birth spacing, lower infant mortality risk, and reduce the number of abortions, especially unsafe ones. It is also shown especially to lower maternal mortality and maternal morbidity associated with the increasing figures of unintended pregnancy (2).

The rapid population growth is expressed in the world as the greatest obstacle in the social, economic and cultural development of nations. While, family planning is considered as a vital basis in sustainable developing of communities as it helps couples decide voluntarily, based on their knowledge and insight, upon their childbearing according to their economical, physical and mental possibilities, and make a balance between sustainable development and population growth. In the years 1960-1970, the concept of family planning was largely included population policies for controlling fertility, decreasing population growth and confining the birth. But in 1994, the concepts of reproductive health and family planning were the main interests of policy makers and planners of world development in the International Conference on Population and Development (ICPD) in Cairo (1994). Since then, the concept of family planning has been separated from population controlling concept and it has been expressed as an essential element in reproductive rights, empowerment of women and improving women's position in society (3-4). The US Agency for International Development (USAID) defines family planning as activities that "enable couples to determine whether, when, and how often to have children (5).

Family planning methods reduce fertility rates and maternal deaths, and thus contribute to reducing maternal mortality rate (MMR). Family planning reduces MMR by reducing the total number of pregnancies (parity) as well as the number of unintended, unwanted and untimely pregnancies which often have high risk. Reducing unwanted pregnancies will reduce induced abortions. Abortions are estimated to be the cause of 5% -18% of maternal deaths (6-7).

For the first time, birth control information center was established in London in 1928. In 1930, following the Seventh International Conference on Birth Control in Zurich, the center was re-organized as the Birth Control International Information Centre (BCIIC). The family size increased from 1940 until 1957, when the average number of children per family peaked at. In 1960, the era of modern contraception began when both the birth control pill and intrauterine device (IUD) became available. These effective and convenient methods resulted in widespread changes in birth control. By 1965, the pill had become the most popular birth control method, followed by the condom and tubal ligation (8).

Preventing pregnancy-related health risks in women could be obtained by implementing the following measures.

- Reducing mortality rate and averted abortion and still birth.
- Reducing infant mortality.
- Helping to prevent HIV/AIDS and STDs.
- Empowering people and enhancing education.
- Reducing adolescent pregnancies.
- Slowing population growth (9).

Worldwide, an estimated 222 million women in developing countries have an unmet need for modern contraceptives. This deficit puts women at risk of unintended pregnancies, which can result in unsafe abortions or even maternal death. Such a high level of unmet need underscores the pressing global health problem of access to modern contraceptive services, an issue the wider reproductive health and donor community has recognized and prioritized. Recently, the July 2012 Family Planning Summit announced a commitment to reach 120 million additional women in the world's poorest countries with family planning services, in order to reduce the number of unintended pregnancies and improve maternal and child health (10-11).

WHO estimates that 13% of the maternal deaths are due to unsafe abortion. Worldwide, approximately 50 million women resort to induced abortion, which frequently results in high maternal morbidity and mortality. Thus, family planning and spacing among births are one of the methods to avoid these deaths (12).

Children born less than two years apart are twice as likely to die in the first year of life as those born after an interval of at least two years. Furthermore, closely spaced pregnancies are more likely to result in low-birth weight (LBW) babies. Finally, close spacing also interferes with breast-feeding which has a vital role in child nutrition and in building the child's resistance against infectious disease. Family planning can help women to achieve optimum spacing between births (13).

Each year there are about 250 million pregnancies globally and one third of these are unintended and 20.0% of these undergo induced abortion. In low income countries, more than one third of 182 million pregnancies are unintended. In low income countries, the women who do not use any contraceptive contribute to two third of unintended pregnancies where more than 100 million married women have unmet need for contraception. Unsafe abortion has much ill effects in women's health. Each year, about 68,000 women die because of unsafe abortion, and millions of women end up with many complications of unsafe abortion which could include severe infection and bleeding (14).

The prevalence of spontaneous abortion can range from 5% to 70% of pregnancies depending on stage of development. Worldwide, 22% of pregnancies

(about 42 million) are electively terminated and 20 million terminations happen under unsafe conditions mostly in the developing world. Contraception plays a key role in reducing reliance on elective abortions and can avert as many as 13%–15% of the maternal deaths that result from unsafe abortions (15).

Contraception is defined as the intentional prevention of conception through the use of various devices, sexual practices, chemicals, drugs, or surgical procedures. Thus, any device or act whose purpose is to prevent a woman from becoming pregnant can be considered as a contraceptive. In any social context, effective contraception allows a couple to enjoy a physical relationship without fear of an unwanted pregnancy and ensures enough freedom to have children when desired. The aim is to achieve this with maximum comfort and privacy, at the same time minimum cost and side effects. Some barrier methods, like male and female condoms, also provide twin advantage of protection from sexually transmitted diseases (STDs) (16).

There are two types of contraceptive methods: Modern methods and traditional methods.

Oral pill: Combined oral contraceptives (COCs) or "the pill" contains two hormones (estrogen and progestogen). It prevents the release of eggs from the ovaries (ovulation) 99% with correct and consistent use, it reduces the risk of endometrial and ovarian cancer; should not be taken while breastfeeding and 92% as commonly used. Progestogen-only pills (POPs) or "the minipill" contains only progestogen hormone, not estrogen, it thickens cervical mucus to block sperm and egg from meeting and prevents ovulation 95% with correct and consistent use. It can be used while breastfeeding and must be taken at the same time each day and 90– 97% as used commonly (10).

Implants: These are small, flexible rods or capsules placed under the skin of the upper arm; contain progestogen hormone only same mechanism as POPs healthcare provider must insert and these could be removed; can be used for 3–5 years depending on implants, irregular vaginal bleeding common but not harmful (10). Injectables : Progestogen only Injectables are injected into the muscle every 2 or 3 months depending on product, same mechanism as POPs with correct and consistent use, delayed return to fertility (1–4 months) after use; irregular vaginal bleeding common, but not harmful and 97% as commonly used (10). Monthly injectables or combined injectable contraceptives (CIC) are injected monthly into the muscle, contain estrogen and progestogen same mechanism as COCs 99% with correct and consistent use. Irregular vaginal bleeding is common, but not harmful and 97% as commonly used (10).

Intrauterine device (IUD): Copper containing IUDS small flexible plastic device containing copper sleeves or wire that is inserted into the uterus. Copper component damages sperm and prevents it from meeting the egg 99%. Longer and heavier periods during first months of use are common but not harmful; can also be used as emergency contraception. Levonorgestrel IUD is A T-shaped plastic device inserted into the uterus that steadily releases small amounts of Levonorgestrel each day. It suppresses the growth of the lining of uterus (endometrial) 99%, reduces menstrual cramps and symptoms of endometriosis; amenorrhea has reported in a group of users (10).

Male condoms: Sheaths or coverings that fit over a man's erect penis; forms a barrier to prevent sperm and egg from meeting 98% with correct and consistent use, also protects against sexually transmitted infections, including HIV and 85% as commonly used (10).

Female condoms Sheaths: Sheaths or linings that fit loosely inside a woman's vagina, made of thin, transparent, soft plastic film; forms a barrier to prevent sperm and egg from meeting 90% with correct and consistent use Also protects against sexually transmitted infections, including HIV and 79% as commonly used(10).

Male sterilization: (vasectomy); permanent contraception to block or cut the vas deferens tubes that carry sperm from the testicles; keeps sperm out of ejaculated semen 99% after 3 months semen evaluation, 3 months delay in taking effect while stored sperm is still present; does not affect male sexual performance; voluntary and informed choice is essential and 97-98% with no semen evaluation (10).

Female Sterilization: (tubal ligation): Permanent contraception to block or cut the fallopian tubes. 99% eggs are blocked from meeting sperm. Voluntary and informed choice is essential.

Emergency contraception: (Levonorgestrel 1.5 mg); Progestogen-only pills taken to prevent pregnancy up to 5 days after unprotected sex. It prevents ovulation, reduces risk of pregnancy by 60–90% does not disrupt an already existing pregnancy (10).

Traditional methods; Lactational amenorrhea method (LAM): Temporary contraception for new mothers whose monthly bleeding has not returned; it requires exclusive breastfeeding day and night of an infant less than 6 months old, prevents the release of eggs from the ovaries (ovulation) 99% with correct and consistent use. It is a temporary family planning method based on the natural effect of breastfeeding on fertility and 98% as commonly used.

Withdrawal (coitus interruptus): Man withdraws his penis from his partner's vagina, and ejaculates outside the vagina, keeping semen away from her external genitalia; this method tries to keep sperm out of the woman's body, preventing fertilization 96% with correct and consistent use. It is one of the least effective methods, because proper timing of withdrawal is often difficult to determine and 73% as commonly used.

Fertility awareness methods- (natural family planning or periodic abstinence) Calendar-based methods: depend on monitoring fertile days in menstrual cycle and symptom-based methods depend on monitoring cervical mucus and body temperature. The couple prevents pregnancy by avoiding unprotected vaginal sex during most fertile days, usually by using condoms 95-97% with correct and consistent use, this method can be used to identify fertile days by both women who want to become pregnant and women who want to avoid pregnancy. Correct, consistent use requires partner cooperation and 75% as commonly used (17).

The prevalence of contraceptive use is high in European, many Latin American, and East and Southeast Asian countries. Contraceptive use among

7

partnered women aged 15–49 years in the developing world rose from 14% in the mid-1960s to 62% in 2008 and from protecting approximately 70 million to more than 600 million couples from unintended pregnancies. Rapid adoption of contraception has been documented in countries as diverse as Thailand, Iran, Egypt, and Colombia between the mid-1980s and mid-2000s (18-19).

Worldwide, contraceptive prevalence increased from 54.8% (95% confidence interval (CI) 52.3-57.1) in 1990, to 63.3% (CI: 60.4-66.0) in 2010, and unmet need for family planning decreased from 15.4% (CI: 14.1-16.9) in 1990, to 12.3% (CI: 10.9-13.9) in 2010. Almost all sub-regions, except for those where contraceptive prevalence was already high in 1990, had an increase in contraceptive prevalence and a decrease in unmet need for family planning between 1990 and 2010, although the pace of change over time varied between countries and sub regions. In 2010, 146 million (130-166 million) women worldwide aged 15-49 years who were married or in a union had an unmet need for family planning. The absolute number of married women who either use contraception or who have an unmet need for family planning is projected to grow from 900 million (876-922 million) in 2010 to 962 million (927-992 million) in 2015, and will increase in most developing countries (20).

In the United States 62% of women of reproductive age are currently using contraception. Of women using a contraceptive method in the month of the interview, the most common methods used are the pill (28%, or 10.6 million women) and female sterilization (27%, or 10.2 million women). Use of intrauterine devices as a current method has increased since 1995 (from 0.8% in 1995 to 5.6% in 2006–2010), whereas fewer women report that their partners are using condoms as their current, most effective contraceptive method. Of women at risk of an unintended pregnancy, 11% report not currently using a method of contraception (21).



Figure 1.1. Distribution of contraceptive prevalence in different countries, subregions and regions (21).

Figure 1.1 describes the percentage of women aged 15-49 years who were married or in a union who used a contraceptive method or who had an unmet need for family planning in 1990 and 2010 by world development group, and sub region (21). According to the most recent data available, contraceptive prevalence among women of reproductive age who are married or in a union varies between 3% in Chad and 88% in Norway. Globally, contraceptive prevalence is estimated at 63%

and it is somewhat higher in the more developed regions (72%) than in the less developed regions (61%), but in both a high proportion of women of reproductive age who are married or in a union are using contraception. In the majority of the less developed regions contraceptive prevalence is 50% or more. The major exceptions are sub-Saharan Africa, Melanesia, Micronesia and Polynesia, where the estimated levels of contraceptive prevalence are still below 40%. As a region, Sub-Saharan Africa has the lowest level of contraceptive prevalence, with only 22% of women of reproductive age who are married or in a union using some method of contraception (22). Over half of the 48 countries in sub-Saharan Africa with data available have a level of contraceptive prevalence below 20% and they are located mainly in Western Africa and in the Horn of Africa. In all other regions of the developing world, contraceptive prevalence is high: 61% in Northern Africa (excluding Sudan), 66% in Asia, and 73% in Latin America and the Caribbean (22). Only six of the 47 countries of Asia with data available have levels of contraceptive prevalence below 30%, namely, Afghanistan, Pakistan, Saudi Arabia, Timor-Leste, the United Arab Emirates and Yemen. No country in Latin America and the Caribbean has a level of contraceptive prevalence below 30%. However, 10 of the 37 countries in that major area having the required data have contraceptive prevalence levels below 50%, namely, Anguilla, Belize, Dominica, Guatemala, Guyana, Haiti, Saint Kitts and Nevis, Saint Lucia, Suriname, and Trinidad and Tobago. Northern America has the highest level of contraceptive prevalence in the world (78%) (22). Europe as whole has a level of contraceptive prevalence not far below that of Northern America (73%) but four of the 36 countries with data in that major area have levels of contraceptive prevalence below 50%, namely, Bosnia and Herzegovina, Montenegro, Serbia and the Former Yugoslav Republic of Macedonia. Trends in contraceptive prevalence contrast among development groups (22).

In more developed regions, contraceptive prevalence has been high for many decades and its level has changed little since 2000. In the less developed regions, contraceptive prevalence has increased substantially in the past decade. Among 39 % of the developing countries with data, contraceptive prevalence has increased by more than half a percentage point per year since 2000 and in 16 % of the developing countries the increase has averaged at least one percentage point per year. However,

in 61 % of the developing countries with data the increase in contraceptive prevalence has been half a percentage point or less per year, and in 26 per cent of the developing countries contraceptive prevalence declined between 2000 and 2009. This group includes several of the countries whose most recent contraceptive prevalence levels are below 20 per cent, such as Burundi, the Central African Republic of Togo and Turkey contraceptive prevalence is 74 (23-24).

Contraceptive prevalence rate according to WHO in major six areas in the world is shown in Table 1.1. (25).

 Table 1.1. Distribution of contraceptive prevalence rate according to WHO in major six areas in the world

Region	%
European Region	71.0
American Region	73.0
East Mediterranean Region	45.0
Western Pacific Region	80.0
African Region	27.0
South East Asian Region	59.0

Afghanistan has suffered over two decades from war, and the country faced major health issues including reproductive health. Family planning was first introduced in 1970 in the country. Department of Family Planning under the direct supervision of Ministry of Public Health was established. However, the department was closed by Mujahidin Government in 1992. As 1980's and 90's were years of civil war and chaos in Afghanistan, in 2002, a survey by the United Nations Department of Economics and Social Affairs studied the contraceptive prevalence trend between 1972 and 73 to 2000. The findings indicated that there has been a small change in contraceptives prevalence. Contraceptive prevalence (any method) has been increased from 1.6% in 1972 and 73 to 4.8% in 2000, and modern method increased from 1.6% to 3.6% (26).

The insignificant contraceptive prevalence rate is mainly due to unstable political setting during this period. However, the picture is different after 2000 as government policy from 2003 is to promote family planning by facilitating access to contraceptive methods. The family planning awareness program as a part of safe motherhood campaign had great impact on knowledge of contraceptive, however not on contraceptive use. In 2010, a survey by Afghan Public Health Institute showed that 91.8% of married women ages between15-49 have some knowledge of contraceptive methods. Eighty-six percent of respondents knew about pills and 83.2% reported to know about injectable. Emergency contraceptives and male sterilization was less known among respondent (emergency contraception 13.2%, male sterilization 15%). Unfortunately, lack of data on unmet need, make it difficult to examine the influential factors (27).

Afghan women have one of the world's highest lifetime risks of maternal death. In the last three decades, conflict has devastated the country's health infrastructure. Total fertility rate was one of the world's highest fertility rates. Contraceptive use was low and there were no Afghan models of success for family planning. The contraceptive prevalence rate increased by 24–27% in 8 months in the haughty project areas. Men have supported modern contraceptives once they have understood contraceptive safety, effectiveness and non-harmful side-effects. Injectable contraceptives contributed most to increases in contraceptive use (28).

Contraceptive prevalence in Afghanistan was 21.20% as of 2011. Its highest value over the past 38 years was 22.80% in 2008, while its lowest value was 1.60% in 1973. According to the World Health Statistics in 2013 the contraceptive prevalence rate raised to 22% in Afghanistan (29).

## 1.1. Objectives:

The objectives of this study are:

- To determine the prevalence of family planning method use.
- To determine the level of knowledge of women on family planning.

• To determine the infertility prevalence and to determine the related factors of family planning method use and infertility among married women aged from 15 years to 49 years in Nadersha Kot District in Khost province of Afghanistan.

## 2. GENERAL KNOWLEDGE

### 2.1. Reproductive health definition

Reproductive health is a state of complete physical, mental and social wellbeing, and not merely the absence of reproductive disease or infirmity. Reproductive health deals with the reproductive processes, functions and system at all stages of life. Reproductive health, therefore, implies that people are able to have a responsible, satisfying and safe sex life and that they have the capability to reproduce and the freedom to decide if, when and how often to do so (30).

Increased access to family planning services is regarded as one of the ten greatest public health achievements in the 20th Century. Family planning is comprised of a wide array of sexual and reproductive health services including contraceptive education and counseling; pregnancy testing and counseling; breast and cervical cancer screening; human immunodeficiency virus (HIV) testing screening and treatment for sexually transmitted diseases (STDs); and other patient education and referrals (31-32).

#### 2.2. Back ground

Family planning plays a pivotal role in population growth, poverty reduction, and human development. Evidence from the United Nations and other governmental and nongovernmental organizations supports this conclusion. Failure to sustain family planning programs, both domestically and abroad, will lead to increased population growth and poorer health worldwide, especially among the poor. However, robust family planning services have a range of benefits, including maternal and infant survival, nutrition, educational attainment, the status of girls and women at home and in society, human immunodeficiency virus (HIV) prevention, and environmental conservation efforts. Family planning is a prerequisite for achievement of the United Nations' Millennium Development Goals and for realizing the human right of reproductive choice. Despite this well-documented need, the U.S. contribution to global family planning has declined in recent years (33).

The current level of modern contraceptive use results in 1.1 million fewer newborn deaths annually. Meeting the need for modern contraceptives could avert at least half a million (590,000) more newborn deaths each year. In addition, if women had the means to space their births three years apart, infant mortality would drop by 24% and under-five mortality would fall by 35%. If there were at least two years between a birth and a subsequent pregnancy, deaths of children under-five would fall by 13%; if the gap were three years, such deaths would be decreased by 25% (34).

Despite the development and availability of family planning services, the level of unmet need for family planning in many countries, continues to increase. This suggests that innovative approaches are needed to extend the access to family planning services for women and couples who want to limit their family size, but are currently not using contraceptive methods (35).

#### **2.3.** Family planning history

The "modern" birth control movement is largely believed to have started in 1915 with Margaret Sanger credited as the champion of the movement.

Margaret Sanger created a birth control organization in 1916 that would later grow into the worldwide organization commonly known as Planned Parenthood (36).

#### 2.4. The Traditional Role of Women: Early Views on Family Planning

Contraception is not a new concept. Since ancient times, couples have attempted to utilize contraception in various forms. Throughout history women have tried to space the births of their children for physical, emotional, social and even economic reasons (37-38).

### 2.5. The Women's Rights Movement of the 1960s

In 1960, the Federal Drug Administration approved the first birth control pill for contraceptive use. Margaret Sanger had a role in developing the contraceptive pill. She helped recruit the necessary funding that allowed for both preliminary research and the first clinical trials of what is now known as "the pill. With the introduction of
the pill, women were offered an easy, relatively safe, and effective means of personally controlling their reproductive systems for the first time (39, 40).

#### 2.6. Contraceptive methods use and abortion

It is estimated that 80 million unexpected pregnancies yearly occur in the world of which 45 million ends in abortion. In this direction, appropriate application of family planning is very helpful through reduction of mortality as a result of abortion, achievement to success in the promotion of maternal health, enhancement of women's social position and overall social-economic development. The major causes of unexpected pregnancies are the failure in contraception methods and lack of selecting an efficient contraception method. On the other hand, appropriate and constant use of contraception methods is under the influence of having sufficient information about these methods and their side-effects. The best way to leave these problems out or to modify them is conducting counseling during the selection of a contraception method (41-42).

Of the 77 countries with liberal abortion laws, 36 are in the developing world. In 2008, abortion rates in the 25 countries with complete records-all of which were developed Countries ranged from seven (Germany and Switzerland) to thirty (Estonia) per 1,000 women aged 15-44 years. Abortion rates declined in most of the 20 countries with consistently reliable information on trends between 1996 and 2008; declines were generally steeper than increases, although the pace of decline slowed after 2003. The highest observed abortion rates were in developing countries with incomplete estimates. For most developing countries that had liberal laws, the reported abortion rates were incomplete and varied widely (43).

At any specific point in time, women of childbearing age are using or not using contraception depending on whether they are sexually active and their current plans, intentions, and expectations for future births. These plans may be influenced by a number of factors, including: whether they are sterile, infertile, or sub fecund; their perceived ability to become pregnant; and their age, race and ethnicity, marital status, income, religion, and past fertility. To examine all women by whether they are currently using contraception, the contraceptive method chosen among users, and categories of nonuse among nonusers in order to describe differentials in the risk of unintended pregnancy by age. Overall in 2006–2010, 62% of women aged 15–44 were using a method of contraception in the month of interview and 38% were not (44).

## 2.7. Family planning methods use in girls aged 15-19 years

Many adolescent girls between 15 and 19 get pregnant; about 16 million women 15– 19 years old give birth each year, about 11% of all births worldwide (45).



Figure 2.7.1. Teenage pregnancy

Afghanistan has one of the highest total fertility rates (TFR) in the world. The total fertility rate is high at 6.6 births per woman. However, data on disparities by socio economic groups is not yet available. Adolescent fertility rate is high which adversely affects not only young women's health, education and employment prospects but also that of their children. Births among 15–19 year olds are associated with the highest risk of infant and child mortality as well as a higher risk of morbidity and mortality for the young mother. In Afghanistan, there are 120 reported births per 1,000 women aged 15–19 years (46).

There are large disparities between and within the countries of Eastern Europe and Central Asia (EECA) in terms of adolescent birth rates as could be seen in Figure 2.7.2. Adolescent birth rates range from 8 in Bosnia and Herzegovina to 54 in Tajikistan. Other countries with high fertility rates among women under the age of 20 include Georgia, Azerbaijan, Romania, Bulgaria and Turkey. The Caucasus is the sub-region with the highest adolescent birth rate (an average of 37.3), while the average for the entire region is 32, significantly higher than the rates found in Western Europe (47).

**Figure 2.7.2.** Percentage of all live births to mothers aged <20 and adolescent birth rate, by country 2009-2011 (47).



#### 2.8.Worldwide unintended pregnancy

In 2010, there were an estimated 225,600 unintended pregnancies in England -97% of which (218,100) were paid by the National health survey (NHS). Of these, 155,500 led to induced abortions, 53,900 to births, 7,500 to spontaneous abortions and 1,200 thousand to ectopic pregnancies (48).

Unintended pregnancy can carry serious consequences for women and their families. It estimated the incidence of pregnancy by intention status and outcome at worldwide, regional, and sub-regional levels for 2008, and it assessed recent trends since 1995. Numbers of births are based on United Nations estimates. Induced

abortions are estimated by projecting from recent trends. A model-based approach is used to estimate miscarriages. The planning status of births is estimated using nationally representative and small-scale surveys of 80 countries. Of the 208 million pregnancies that occurred in 2008, it was estimated that 41 percent were unintended. The unintended pregnancy rate fell by 29 percent in developed regions and by 20 percent in developing regions. The highest unintended pregnancy rates were found for Eastern and Middle Africa and the lowest for Southern and Western Europe and Eastern Asia. North America is the only region in which overall and unintended pregnancy rates have not declined. It concludes with a brief discussion of global and regional program and policy implications (49).

# 2.9. Contraceptive methods in unmarried women

Contraceptive use and total demand for contraception is generally higher among young unmarried women. In some countries, such as Haiti and Mozambique, almost half of sexually active, unmarried women ages 15 to 19 have an unmet need for family planning. Meeting the family planning needs of young unmarried women can be particularly challenging given the stigma many face when accessing reproductive health services (50).

Family planning efforts were linked to fertility reduction and in turn to slowing population growth policy goals that aimed to enhance a country's prospects for economic development. As well as attempting to control fertility, governments sought to lower child mortality, eradicate infectious diseases, increase education levels, improve nutritional status and food security, modernize agriculture and expand their economies with manufacturing and industrialization (51).

#### 2.10. Contraceptive usage in developing countries

Millions of girls and women in the world's poorest countries can transform their lives if needs for family planning to delay, space, and limit the number of children that women have are met. Across the developing world, some 222 million women who want to avoid pregnancy are not using a modern method of contraception. Despite progress in some areas of the world, this situation has changed little in the past decade (Table 2.1) (52).

Table.2.1. Distribution of number of 9 millions of women aged 15-49 years in developing countries and those wanting to avoid pregnancy by regional and sub-regional 2003, 2008 and 2012

Region and Sub region	Number (millions) Of Women15-49		Numbers (millions) and percentages wanting to avoid pregnancy			
	200 3	2008	2012	2003	2008	2012
All developing	132	1448	1520	716 (54%)	827 (57%)	867 (57%)
countries	1					
AFRICA	204	240	260	81 (40%)	99 (41%)	110 (42%)
Sub-Saharan Africa	16	195	213	64 (39%)	78 (40%)	89 (42%)
Eastern Africa	63	73	81	25 (39%)	31 (43%)	37 (45%)
Middle Africa	23	28	31	8 (35%)	12 (41%)	12 (40%)
Southern Africa	14	15	16	9 (63%)	10 (64%)	11 (70%)
Western Africa	56	69	75	20 (35%)	24 (35%)	26 (35%)
Northern Africa	48	55		20 (41%)	23 (41%)	23 (40)
AISIA	970	1052	1098	549 (57%)	631 (60%)	655 (60%)
Eastern Asia	380	388	392	251 (57%)	285 (74%)	283 (72%)
Central Asia	16	17	17	8 (51%)	9 (51%)	8 (47%)
South Asia	373	428	458	185 (50%)	232 (54%)	246 (54%)
Southeast Asia	148	159	167	77 (52%)	76 (48%)	89 (53%)
Western Asia	52	58	62	27 (52%)	28 (49%)	27 (44%)
Latin America and	147	155	162	85 (58%)	96 (62%)	103 (63%)
the Caribbean						
Caribbean	10	11	11	5 (52%)	7 (63%)	6 (59%)
Central America	38	40	43	19 (50%)	22 (53%)	23 (52%)
South America	98	104	108	61 (62%)	68 (65%)	73 (68%)
69 poorest countries	651	775	833	304 (47%)	380 (49%)	414 (50%)
High-income	670	672	687	411 (61%)	447 (66%)	452 (66%)
countries						

(53).

## 2.11. Contraceptive use by the view of Islam

In Afghanistan 80% of men, 86% of women, 82% of male religious leaders and 98% of female religious leaders believe that family planning is in keeping with the tenets of Islam. Among religious leaders, 36% reported that they had preached about family planning in the year preceding the survey. Seventy-five percent of women and 62%

of men in the general public said that they had spoken about family planning with their spouse, and 9% and 17%, respectively, reported having spoken with a religious leader (54). On a scale of 0-10 measuring agreement with statements regarding the benefits of family planning (with 10 being complete agreement), women averaged 9.4 and men 8.8, while male religious leaders averaged 6.5 and female religious leaders 7.2. Among the general public, 74% of women and 58% of men said that deciding to practice contraception is a joint decision between husband and wife. About 90% of religious leaders agreed or agreed strongly with the statement that contraceptive decisions should be made jointly by husband and wife (54). Women were significantly more likely than men to believe that specific contraceptive methods are permitted under Islam, and male religious leaders were more likely than were men in the general population to find specific methods acceptable. Only 26% of men cited interpersonal communication as a source of family planning information, compared with 66% of women, 73% of male religious leaders and 89% of female religious leaders. Almost three-quarters of men and women said they want to know more about family planning (54).

## 2.12. Family planning methods implementation supporting Countries

Rich countries have pledged \$2.6 bn over the next eight years at a family planning summit in London in 2012, in what was described as a breakthrough for the world's poorest women and girls. The money, coupled with commitments from developing countries, is expected to provide access to family planning for 120 million women in the global south (55)

## 2.13. Globally Population growth 1960-2050

Between 1960 and 2005, the global population rose by 114%, from 3 billion to nearly 6.5 billion. Over the next 45 years, the percentage increase is expected to be much lower (40%) but will remain huge in absolute numbers (2.6 billion). These medium-variant UN population projections are highly sensitive to assumptions about future fertility. The United nation (UN) assumes that fertility in Asia and Latin America will fall from 2.4 to slightly below 2.0 births per woman and that it will rise in Europe from its current level of 1.4% to 1.8% (56). In sub-Saharan Africa, fertility

is assumed to drop steadily from more than 5.0 to about 2.5 births by 2050. Under these assumptions, world population is expected to be a little over 9 billion in 2050(74). However, if fertility is half a birth higher or lower over the next 45 years, the global population will reach 10.6 and 7.7 billion, respectively, by 2050. Half the expected increase will come from Asia and 36% from sub-Saharan Africa (56). Differences in regional growth rates are having a profound effect on the distribution of the world's population. Even after allowing for in-migration, Europe's share of total population is expected to decline from 20% in 1960 to 7.2% in 2050, whereas sub-Saharan Africa's share will rise from 7.5% to 18.6% over the same period (56).

# 2.14. Effective factors on FP use in developed, developing and under-developed countries and in Afghanistan.

In Afghanistan, however, the implementation of family planning policies is challenged by social and cultural barriers that surround the acceptance of contraceptive methods that this is due to misconceptions about family planning in some cultural traditions. When it comes to decision-making about family planning, husbands dominate their wives. Yet husbands are also strongly constrained by the pressure of traditions. Son preference is another significant factor that influences contraceptive decisions in Afghanistan (57).

If a woman doesn't bear enough children, especially sons, she will feel shame not only in front of her in-laws but also in front of the whole community. There is also this fear that her in-laws will be tough on her, that her life will become hard and that she will go through depression. For these reasons, a husband's approval of family planning often depends on one or two sons being born (57)

Significant challenges stand in the way of making contraceptives more widely available and accessible, including insufficient donor and developing country funding, lack of appropriate products that meet users' needs, weak distribution systems, lack of reliable monitoring, and cultural and knowledge barriers. Providers restrict clients' access to spacing and long-acting and permanent methods of FP based on age, parity, partner consent and marital status. Qualitative findings reinforce that providers, at times, make judgments about their clients' education, FP

needs and ability to understand FP options thereby imposing unnecessary barriers to FP methods (58).

Many experts have written about Pakistan's family planning program and the reasons for its limited success. Causes related to both the strength and reach of the family planning program and to strong cultural deterrents to contraceptive use, such as religious beliefs and women's limited autonomy in decision-making. Delivery of family planning services has been plagued by weak logistics systems and lack of contraceptive methods at service points as well as staff ill-trained and ill-equipped to provide quality services to clients (59).

# 3. Methodology

## 3.1. Study area and population

Afghanistan is located in south Central Asia, and is completely surrounded by other countries. The countries that border Afghanistan are, Iran in the South and West, Pakistan in the South and East, Turkmenistan, Uzbekistan and Tajikistan in the North, and China in the far Northeast. Afghanistan is located at the center of major North-South and East-West trade routes (60).



Figure.3.1.1. Map of Afghanistan

Afghanistan is a landlocked, mountainous country and the area is 652,863 km2. Administratively the country is made up of 34 provinces, which are further divided into 398 districts and administrative centers and over 47,500 villages (61).

The total population of Afghanistan in the year 2012—2013 was estimated around 27 million of which 51% were male and 49 % females. Distribution of population between urban, rural areas shows that out of the settled population 19.4 million are living in rural and 6.1 million in urban areas in addition 1.5 million are living as nomads. The most striking feature of the Afghan population is its very young age structure .Some 46.1% (11.7million) are under the age of 15 years, where elderly of 65 and over around 3.7 % (60).



Figure.3.1.2. Population pyramid of Afghanistan (60)

The proportion under 15 is among the highest in the world and significantly higher than that of the neighboring countries. This young population contributes to a very high dependency ratio. For every 100 persons in the working age 15-59 there are 107 persons in the less productive ages, under 15 and over 60 (60).

Fertility rate in Afghanistan is estimated at an average of 5.1 children per woman. While still quite high growing at 2.6 percent per year, the population is on pace to double every 26 years this rate is significantly lower than previous estimates, which placed Afghanistan among the highest fertility rates in the world. The most recent fertility range 5.8 to 6.6 children per woman. Even these estimates are lower than those for the 1990s, when the UN pegged the fertility rate at eight children per woman (62).

Afghanistan has faced numerous challenges in providing health services to its culturally and geographically diverse population. The mountainous terrain, particularly in the northern parts of the country, provides a physical barrier to care, while decades of conflict have placed great burdens on the country's public health system (63) (Annex 1).

Of the over thirty languages spoken in Afghanistan, The official languages are Pashtu and Dari (Afghan Persian) (63). In Afghanistan, malnutrition and communicable diseases remain among the most important causes of morbidity and mortality. Agriculture is the main source of the country's economy; it employs nearly 85 % of the population and produces about two-thirds of the national income (63). The people of Afghanistan have been living in a protracted state of conflict and instability for three decades. In addition to uncertain security, the extreme mountain terrain and harsh climate make it difficult to access education especially for girls. Under the Taliban regime violence and intimidation were routinely used to prevent girls and women from attending school and gaining the education that is their right. In this setting, the education system floundered, and fewer than 1 million children were attending school. (64).

After the fall of the Taliban in 2001, UNICEF assumed the role of the Government's leading partner in the reconstruction of the education sector. This included a successful back-to-school campaign, resulting in millions of children gaining access to both formal and non-formal education. Additionally, UNICEF's partnerships with the Ministry of Education, shuras (councils) and village leaders have supported school construction and other improvement programs. More recently, these efforts with communities have resulted in the reopening of 400 schools in areas most affected by violence and intimidation against education (65).

In 2011, Afghanistan became the 44th member of the Global Partnership for Education (GPE), a consortium of donor and developing countries working to enhance the quality of education systems. The MoE has subsequently developed a multi-year proposal to strengthen school enrolment, with a special emphasis on girls in some of the least served and insecure Provinces. UNICEF is performing the role of the Supervising Entity for the GPE, and in this capacity will be responsible for coordinating activities amongst multiple stakeholders and overseeing the dispersal of the three year grant, which is expected in early 2012. Adult male literacy rate more than 15years age was 39% and adult female more than 15years age was 13% (65).

Khost Province's total population is 546,800 and female population is 266,800. Women among age group (15-49) total population is 93,380. Khost province has 12 districts and is the southeast region of the country. The province covers an area of 4029 km2. Around two-fifth of the province (59%) is mountainous or semi-mountainous terrain. Almost all of the population (98%) of Khost lives in rural districts. Around 51% of the population is male and 49% is female. The major ethnic groups living in Khost Province are Pashtuns. Pashtu is spoken by 99% of the villages. Dari is spoken in two villages with around 1,000 residents (60).

The overall literacy rate in Khost Province is 28%, however, while more than two-fifths of men are literate (44%), this is true for just seven percent of women. On average 38% of children between 6 and 13 are enrolled in school, however the figure is around two-thirds of boys (61%) and only one-seventh of girls (14%) (66).



Figure.3.1.3. Khost province Map

Khost is both an agricultural and an industrial province. In terms of industry, cold drink, soft drink, iodine salt and plastic factories are working in the Province. Afghanistan is a major source of revenue for nearly half (46%) of household in Khost Province and over half (54%) of rural household own or manage

Agricultural land or garden plots. However, around half of households (45%) in rural areas derive income from trade and services and a quarter (24%) earn income through non-farm related labor. Livestock also accounts for some income for around a third (36%) of rural households.

Since there is a serious security problem in Afghanistan visiting every District and rural areas of this Province would be dangerous for the researcher. For this reason, being one of the rather secure districts. Nadersha Kot District has been chosen for this survey (66).



Figure.3.1.4. Nadersha Kot District Map

Nadersha Kot District: is situated in the western part of Khost city Province, Afghanistan. It borders Paktia Province and Shamal District to the west, Qalandar District to the north, Musa Khel District to the northeast, Khost (Matun) District to the east, Mando Zayi District to the southeast and Tani and Spera districts to the South. Total population of this district is 31000 and numbers of married women among the age group15---49 is 14,700 (60).

**3.2. Study type**; This is an observational population based cross sectional study to estimate the prevalence of family planning methods among ever married women aged 15-49 years.

## 3.3. Universe, sample and sample selection:

It was calculated by using the standard formula for sample size estimation of cross sectional study at the 95% confidence level with an estimated proportion of 0.22 and desired precision of 0.4.The sample size was adjusted for estimated design effect of 2.The minimum sample size was calculated by the following formula in which;

 $\alpha = 0, 05$ t=1.96 d=0.04 p= 0. 22 q= 1-p DE= (Design effect) = 2  $n = \frac{Nt^2 pq}{d^2 (N-1) + t^2 pq} = \frac{14700 \cdot (1.96)^2 \cdot 0, \ 22 \times 0.78}{(0.04)^2 (14700 - 1) + ([1.96))^2 \times 0.22 \times 0.78} = 401$ 

 $n \times DE = 401x 2 = 802.$ 

Considering the non-response rate as 10%, the calculated sample size has been increased to 883 women.

After approval of the project by the Research Committee of Sheikh Zaid University of Khost Province, for data collection the researcher was introduced by directorate of Medical faculty to the Public Health Directorate and Health Net/ TPO (NGOs) in Khost Province, which monitor the health centers of Nadersha Kot (District). Nadersha Kot District is defined by the Government in 45 villages. These villages were considered as clusters in this survey. Before the data collection, it was asked the health supervisor of Nadersha Kot (District) about influential tribal and the central point of the 45 villages (clusters) (Annex 3 List of villages) and then the data collection was done based on the method defined below.

Before collecting the data, the villagers were fully informed about the importance of the study and after, the permission of their senior tribal leader and information of estimated household numbers of villages had been obtained. The sample size divided by the number of the clusters  $(883 \div 45 = 20)$  in order to calculate the minimum number of women from each cluster which was 20 women. After reaching the village a central point was defined first. Beginning from this point, moved four directions and every household was visited until reaching 20 women. There were two teams for data collection in the field; each team was consisted of one midwife and nurse (female and one male) and interviewed women from each of four direction of the defined central point of villages. In each household, all of the names of eligible women were recorded first. If there were more than one eligible woman in the household was selected randomly, and interviewed. If it selected woman was not at the home it was waited for 20 minutes and if she had not came back within this period, the next nearest house was visited. Every day, it was tried to cover two villages, and was quite successful in doing so, except in the villages which were far away from the district center or the villages themselves had long distances from one another. In this case, only one village was visited in one day. Once it was accomplished interviewing women from Nadersha Kot District, it was reported to the District's Health Services Officer who then officially reported the results to the Public health related NGO's and finally the public Health center and NGO's officially informed Medical Faculty of the University that the researcher was successfully covered Nadersha Kot District. The data collection process was held between 26 March and 27 April 2014.

Following are described inclusion and exclusion criteria of the study

The inclusion criteria:

- Being currently married.
- Being between 15—49 years of age.
- Being a woman.
- Being a permanent residence of Nadersha Kot District( lived at least one year)
- Being in cooperation with the staff.

Exclusion Criteria:

- Being under age 15 or over 49.
- Being a male.
- Being not a permanent resident of Nadersha Kot District.
- Being not cooperative.
- Being not currently married

**3.4. Data collection instrument**: Through household visit based on face to face interview data collected via a pre- tested structured, questionnaire. The questionnaire was translated from English to native language (Pashto) and was pre-tested with 40 respondents in a rural area and necessary alteration and modifications were made before the questionnaire was widely administered Annex (2).

The questionnaire included questions related to characteristics of women and husband family planning methods knowledge and practice pregnancy and delivery history.

Man power: Data was collected by the researcher himself with the support of trained two female midwives and one male nurse.

Training prior to data collection for field staff: Three days seminar was conducted for the field staff in March 2014. There was tree trainee two female midwife and one male nurse. The training was performed by the researcher. Training included lectures on importance of family planning, objective of the study, data collection technique by face to face interview and explanation of the questionnaire. During training, trainees were trained on different aspects of data collection process. They were provided with the opportunity to exercise data collection in the class environment through role playing and simulations. Trainees also participated in pre-test procedure to apply their gained knowledge and skill.

# 3.5. Study variables;

# 3.5.1. Dependent variables

- Knowledge about family planning methods
- Ever- use of planning methods
- Currently-use family planning methods
- Place of the last delivery
- Future intention to use the family planning methods

# 3.5.2. Independent variables

- Age
- Age at the first marriage
- Educational status
- Working status
- Perceived socio economic status
- Family type
- Age of husband
- Educational status of husband
- Working status of husband
- Numbers of pregnancies

## 3.6. Ethical issues:

The approval was obtained from the Research Committee of Sheikh Zaid University of Khost Province of Afghanistan, before the initiation of the study verbal consent was obtained from the study participants. The participation to the study was on volunteer basis.

## **3.7.** Data processing:

Data was processed by using SPSS version 15.0 collected data was entered, cleaned and processed. After preliminary analysis, was done by the frequency and other Descriptive statistically was to describe the data, for asses factors relation between independent and dependent variables Chi- square test was used and also binary analysis was used to assess the association between independent and dependent as statistically significant.

## 3.8. Limitation of the study

It is a difficult task to look for people, particularly rural women related to contraceptive methods use in matter how they are educated, majority of them still don't like talking freely about family planning. Therefore the present study was challenging for researcher. It was the main limitation of the study that the researcher had gone through the personal and private matters of married rural women; usually they don't like answering such personal questions like those about knowledge and practice of family planning methods. Still, these questions are treated as social and cultural stigma in Afghanistan. Researcher with the help of trained female field workers tried best to collect as factual data as possible.

#### 4. **RESULTS**

This study design is used to determine the prevalence of family planning methods among the married women aged 15-49 years. The study district Nadersha Kot is located in the western part of Khost Province of Afghanistan. The study was conducted in January 2014 on a total of 885 women.

## 4.1. Some sociodemographic characteristics of women

Some socio demographics of the study participants have been shown on Table 4.1 to 4.8.

Table.4.1.1. Distribution of women by age (Nadersha Kot District-Afghanistan, 2014)

Age group	n	%
<u>≤</u> 19	12	1.4
20-24	112	12.7
25-29	290	32.7
30-34	221	25.0
35-39	124	14.0
40-44	77	8.7
45-49	49	5.5
Total	885	100.0
$M_{\text{con}} + SD = 21.1 + 6.6$ ; Madian = 20	1st quantila - 26. 2rd quantila -25. Min N	1 ar 17 10

Mean  $\pm$  SD =31.1  $\pm$  6.6; Median =30; 1<sup>st</sup> quartile = 26; 3<sup>rd</sup> quartile =35; Min-Max= 17- 48

57.7% of the participants were between the ages of 20 and 34. Women less than 20 years constituted 1.4% and more than 39 years 14.2%.

Level of education	n	%
Illiterate	716	81.0
Literate	42	4.7
Primary school	10	1.1
Secondary school	24	2.7
High secondary school	93	10.5
Total	885	100.0

Table 4.1.2. Distribution of women by the level of education (Nadersha Kot District-<br/>Afghanistan, 2014)

Every four women out of five were illiterate. Only 10.5% were high secondary school graduate.

Table 4.1.3. Distribution of women by the number of marriages (Nadersha Kot District-Afghanistan, 2014)

Number of marriages	n	%
Once	864	97.6
Twice	21	2.4
Total	885	100.0

Most of the participants had their first marriage (97.6%).

Age at first marriage	n	%	Cumulative %
≤15	48	5.4	5.4
16	171	19.3	24.7
17	176	19.9	44.6
18	241	27.3	71.9
19	141	15.9	87.8
20	69	7.8	95.6
21	15	1.7	97.3
≥22	24	2.7	100.0
Total	885	100.0	
Mean $\pm$ SD=17.6 $\pm$ 2.1; Median =18; 1 <sup>st</sup> quartile =17; 3 <sup>rd</sup> quartile =19; Min-Max=16-30.			

Table 4.1.4. Distribution of women by the age at marriage (Nadersha Kot District-<br/>Afghanistan, 2014)

Almost half of the participants, 44.6% were got married before the age of 18.

Table 4.1.5. Distribution of women by the type of family involved (Nadersha Kot District-Afghanistan, 2014)

Type of family	n	%	
Nuclear	37	4.2	
Extended	848	95.8	
Total	885	100.0	

Only 4.2% of participants were living in nuclear families.

Number household members	n	%	
<u>≤</u> 9	41	4.6	
10-12	209	23.6	
13-15	234	26.4	
16-18	273	30.8	
≥19	128	14.5	
Total	885	100.0	
Mean $\pm$ SD= 15.1 $\pm$ 4.1; Median = 15; 1ST quartile=12; 3rd quartile= 18; Min-Max= 5-45.			

Table 4.1.6. Distribution of women by the number of household members (NadershaKot District- Afghanistan, 2014)

The mean number of household members was 15.1±4.1 with a minimum of 5 and maximum 45.

Table 4.1.7. Distribution of women by working status (Nadersha Kot District-

Afghanistan, 2014)

Working status	n	%
Yes	96	10.8
No	789	89.2
Total	885	100.0

Of all participants 10.8% were working at the time of the study.

Table 4.1.8. Distribution of women by self-evaluated economic status (Nadersha Kot District-Afghanistan, 2014)

Self-evaluated economic status	n	%
Low	181	20.5
Medium	375	42.3
High	329	37.2
Total	885	100.0

20.5% of the participants evaluated their socioeconomic status as 'low' 42.3% 'medium' and 37.2% 'high'.

## 4.2. Socio demographic characteristics of husbands

Some socio-demographic characteristics related to the husbands were in Tables 4.9 to 4.12.

# Table 4.2.9. Distribution of husbands by age (Nadersha Kot District-

Age	n	%	
≤24	66	7.5	
25-29	220	24.9	
30-34	266	30.1	
35-39	160	18.1	
40-44	68	7.7	
45-49	93	10.5	
≥50	12	1.4	
Total	885	100.0	
Mean $\pm$ SD= 33.4 $\pm$ 7.1; Median=32;1 <sup>st</sup> quartile = 28.; 3 <sup>rd</sup> quartile = 38; Min-Max=20-53.			

Afghanistan, 2014)

The youngest age of husband was 20 while the eldest was 53, with a mean value of  $33.4\pm7.1$ .

Table.4.2.10. Distribution of husbands by the level of education (Nadersha Kot District-Afghanistan, 2014)

Husbands level of education	n	%
Illiterate	554	62.6
Literate	67	7.6
Primary school	25	2.8
Secondary school	16	1.8
High secondary school	209	23.6
University graduate	14	1.6
Total	885	100.0

62.6 % of the women who replied about their husbands were illiterate; 23.6% were high Secondary School graduates and only 1.6% University graduates.

Consanguinity with husband	n	%
Yes	195	22.0
No	690	78.0
Total	885	100.0

Table. 4.2.11. Distribution of consanguinity with husband (Nadersha Kot District-<br/>Afghanistan, 2014)

One fifth of the couples were relatives

Table.4.2.12. Distribution of working status of husbands (Nadersha Kot District

- Afghanistan, 2014)

Husbands working status	n	%	
Yes	219	24.7	
No	666	75.3	
Total	885	100.0	

Almost 25% of the husbands were working at the time of the study.

Table. 4.13. Distribution of women by having any chronic diseases status (NadershaKot District-Afghanistan, 2014)

Chronic disease status	n	%
No	869	98.2
Yes	16	1.8
Total	885	100.0

Only 1.8% of women stated that they had chronic diseases. 9 of these women had hypertension and 7 had diabetes.

## 4.3. Reproductive history of women

Number of pregnancies	n	%			
None	18	2.0			
1-2	167	18.9			
3-4	298	33.7			
5-6	253	28.6			
7-8	111	12.5			
≥9	38	4.3			
Total	885	100.0			
Mean $\pm$ SD= 4.8 $\pm$ 2.6; Median= 4; 1 <sup>st</sup> quartile =3; 3 <sup>rd</sup> quartile= 6; Min- Max= 1-13.					

Table. 4.3.14. Distribution of women by the number of pregnancies (Nadersha KotDistrict-Afghanistan, 2014)

Eighteen of women had no pregnancy; 62.3% of women had 3-6 pregnancies. The mean number of pregnancies was 4.8±2.6.

Table. 4.3.15. Distribution of ever pregnant women by the number of living children(Nadersha Kot District-Afghanistan, 2014)

Number of living children	n	%
1-2	187	21.6
3-4	322	37.1
5-6	241	27.8
7-8	103	11.9
≥9	14	1.6
Total	867	100.0
Moon $\pm$ SD= $4.2\pm2.0$ : Modion= 4:	1st quartile-2, 2rd quartil	0 -6: Mini Mov-1 11

Mean  $\pm$ SD= 4.2 $\pm$ 2.0; Median= 4; 1<sup>st</sup> quartile=3; 3<sup>rd</sup> quartile =6; Mini- Max= 1- 11.

21.6% of the participants had 1-2 living children, 37.1% had 3-4 living children, 27.8% had 5-6 living children, 11.9%,  $\geq$ 9 numbers 1.6% had 7-8 living children.

Number of still birth	n	%
None	795	91.7
1	65	7.8
≥2	7	0.8
Total	867	100.0
Mean $\pm$ SD= 1.1 $\pm$ 0.4; Median = 1; 1 <sup>st</sup> c	$uartile = 1; 3^{rd}$	quartile = 1; Min- Max=1- 3

Table. 4.3.16. Distribution of women by the number of still birth (Nadersha KotDistrict-Afghanistan, 2014)

Majority (91.7%) of the participants had not still birth at the time of survey and 7.8% of women had one stillbirth and 0.8% of participants had  $\geq 2$  stillbirth. The mean of number of still births was 1.1±0.4.

Table. 4.3.17. Distribution of women by the number of missed abortion (NadershaKot District-Afghanistan, 2014)

Number of missed abortion	n	%		
None	721	83.1		
1	114	13.2		
2	27	3.1		
≥3	5	0.6		
Total	867	100.0		
Mean $\pm$ SD= 1.3 $\pm$ 0.6; Median=1; 1 <sup>st</sup> quartile=1; 3 <sup>rd</sup> quartile=1; Min- Max= 1- 4.				

13.2% of 867 participants had one missed abortion and 3.7% had more than one missed abortion. The mean number of missed abortion was  $1.3\pm0.6$ .

Number of induced abortion	n	%
None	860	99.2
Once	7	0.8
Total	867	100.0

Table. 4.3.18. Distribution of women by the number of induced abortion (NadershaKot District-Afghanistan, 2014)

0.8% of 867 participants had induced abortion.

# 4.4. Some characteristics related to last pregnancy

Table 4.4.19. Distribution of women by the last pregnancy interval (Nadersha Kot District-Afghanistan, 2014)

Interval (months)	n	%
<u>≤6</u>	172	19.8
7-12	270	31.1
13-24	289	33.3
25-36	61	7.1
≥37	75	8.7
Total	867	100.0
M = 100 107 170 M 1	10 1et (1 0 0rd (1	0.1 M $1.0C$

Mean  $\pm$  SD= 18.5 $\pm$  15.8; Median= 12; 1<sup>st</sup> quartile=8; 3<sup>rd</sup> quartile =24; Min Max=1-96

More than two-third (64.4%) of 867 participants had between 7-36 months last pregnancy interval. The mean number of last pregnancy interval was 18.5±15.8.

Place of last delivery/(n=867)	n	%
At home	471	53.2
At health facility	396	44.8
Government hospital	237	26.8
Maternity hospital	96	10.8
Private clinic	63	7.2

Table. 4.4.20. Distribution of women by the place of the last the delivery (NadershaKot District-Afghanistan, 2014)

More than half (53.2%) of the participants delivered at home and less than half (44.8%) of the participants delivered at the health facilities.

Table .4.4.21. Distribution of women by place of the last delivery and age (NadershaKot District-Afghanistan, 2014)

	Place of the last delivery						
	Home		Hospital		Total		
Age groups	n	%	n	%	n	% *	p-value
≤24	52	46.0	61	54.0	113	13.1	
25-29	136	47.6	150	52.4	286	33.0	
30-34	121	55.5	97	44.5	218	25.1	< 0.001
35-39	58	46.8	66	53.2	124	14.3	
40-44	62	80.5	15	19.5	77	8.9	
45-49	42	85.7	7	14.3	49	5.6	
Total	471	54.3	396	45.7	867	100.0	

\*Column percentages; other are row percentages

About 54.0% of the participants at the age group of  $\leq 24$  years delivered at Governmental hospital. (p=0.001).

-	Place of the last delivery						
	Home		Hospital	Tot		al	
Level of education	n	%	n	%	n	%	p- value
Illiterate	417	59.3	286	40.7	703	81.1	
Literate	23	56.1	18	43.9	41	4.7	
Primary school	4	44.4	5	55.6	9	1.1	< 0.001
Secondary school	5	20.8	19	79.2	24	2.7	
High secondary school	22	24.4	68	75.6	90	10.4	
Total	471	54.3	396	45.7	867	100.0	

Table 4.4.22. Distribution of women by place of the last delivery and level of<br/>education (Nadersha Kot District-Afghanistan, 2014)

\*Column percentages; others are row percentages

79.2% of the participants who were secondary school graduates delivered at Governmental hospital. Generally educated women delivered more at the health facilities than uneducated. The p value is 0.001.

Table. 4.4.23. Distribution of women by the place of the last delivery and age at firstmarriage (Nadersha Kot District-Afghanistan, 2014)

	Place of the last delivery						
Age at	Home Hosp		Hospital	Hospital Total			
first marriage	n	%	n	%	n	% *	p- value
≤16	136	62.7	81	37.3	217	25.1	
17	98	56.6	75	43.4	173	19.9	0.012
18	120	51.1	115	48.9	235	27.1	
≥19	117	48.3	125	51.7	242	27.9	
Total	471	54.3	396	45.7	867	100.0	

\*Column percentages; others are row percentages

51.7% of the participants who were in the age group of  $\geq$ 19 years at the first marriage, delivered at Governmental hospital. Generally when the age increased at the first marriage deliveries at Governmental hospital also increased. The p value is 0.012.

	Place of the last delivery									
	Home Hospital			oital	То					
Type of family	n	%	n	%	n	%	p- value			
Nuclear family	30	81.1	7	18.9	37	4.3				
Extended family	441	53.1	389	46.9	830	95.7	< 0.001			
Total	471	53.3	396	45.7	867	100.0				

Table.4.4.24. Distribution of women by the place of the last delivery and type of family (Nadersha Kot District-Afghanistan, 2014)

\*Column percentages; other are row percentages

46.9% of the participants who had an extended family delivered at Governmental hospital. The p value is 0.001. (Statistically the p value is significant).

Table.4.4.25. Distribution of women by the place of the last delivery and workingstatus (Nadersha Kot District-Afghanistan, 2014)

	Place of the last delivery								
	Home Hospital				Total				
Working status	n	%	n	%	n	%	p- value		
Yes	20	21.5	73	78.5	93	10.7			
No	451	58.3	323	41.7	774	89.3	< 0.001		
Total	471	54.3	396	45.7	867	100.0			

\*Column percentages; others are row percentages

78.5% of the participants delivered at Governmental hospital. Generally the women who had job more delivered at Governmental hospital than who did not have a job. The p value is 0.001.

	Place of the last delivery							
Self-evaluated	Ho	me	Hospital		Total			
economical	n	%	n	%	n	% *	p- value	
status								
Low	109	60.9	70	39.1	179	20.6		
Medium	214	58.8	150	41.2	364	42.0	< 0.001	
High	148	45.7	176	54.3	324	37.4		
Total	471	54.3	396	45.7	867	100.0		

Table.4.4.26. Distribution of women by the place of the last delivery and selfevaluated economical status (Nadersha Kot District-Af, 2014)

\*Column percentages; others are row percentages

54.3% of the participants whose self-stated economic statuses were high delivered at Governmental hospital. Generally, women whose self-stated economic status were better delivered more at Governmental hospital than whose self-stated economic status were not better or medium. (p=0.001).

Table.4.4.27. Distribution of women by the place of the last delivery and husbands' age (Nadersha Kot District-Afghanistan, 2014)

	Place of the last delivery						
Husbands'	Hon	Home		Hospital			
age	n	%	n	%	n	% *	p- value
≤24	26	44.8	32	55.2	58	6.7	
25-29	100	46.5	115	53.5	215	25.0	
30-34	140	53.4	122	46.6	262	30.2	< 0.001
35-39	80	50.3	79	49.7	159	18.3	
40-44	38	55.9	30	44.1	68	7.7	
≥45	87	82.9	18	17.1	105	12.1	
Total	471	54.3	396	45.7	867	100.0	

55.2% of the participants whose husbands were at the age group of  $\leq$ 24 years, delivered at Governmental hospital. Generally, women whose husbands were young or middle aged they delivered more at Governmental hospital than women whose husbands were older. The p value is 0.001.

	Place of the last delivery								
	Ho	me	Hospital		Total				
Husbands' level of education	n	%	n	%	n	% *	p- value		
Illiterate	337	62.2	205	37.8	542	62.5			
Literate	45	69.2	20	30.8	65	7.5			
Primary/ Secondary school	16	39.0	25	61.0	41	4.7	< 0.001		
High school /University	73	33.3	146	66.7	219	25.3			
Total	471	54.3	396	45.7	867	100.0			

Table.4.4.28. Distribution of women by the place of the last delivery and husbands'level of education (Nadersha Kot District-Afghanistan, 2014)

\*Column percentages; other are row percentages

62.2% of the participants who were illiterate delivered at home. Generally, women who were uneducated or had less degree of education delivered more at home than women who were educated. The p value is 0.001.

Table.4.4.29. Distribution of women by the place of the last delivery and husbands' working status (Nadersha Kot District-Afghanistan, 2014)

		Place of the last delivery									
Husbands'	Ho	me	Hospit	Hospital							
working status	n	%	n	%	n	% *	p- value				
Yes	74	34.4	141	65.6	215	24.8					
No	397	60.9	255	39.1	652	75.2	< 0.001				
Total	471	54.3	396	45.7	867	100.0					

65.6% of the participants, whose husbands had a job delivered at Governmental hospital. Generally, women whose husbands had job delivered more at Governmental hospital than women whose husbands didn't have a job. (p=0.001).

Table.4.4.30. Distribution of women by the place of the last delivery and number of pregnancies (Nadersha Kot District-Afghanistan, 2014)

	Place of the last delivery								
Number of	Home		Hos	Hospital					
pregnancies	n	%	n	%	n	% *	p- value		
1-2	65	38.9	102	61.1	167	19.3			
3-4	147	49.3	151	50.7	298	34.4			
5-6	148	58.5	105	41.5	253	29.1	< 0.001		
≥7	111	74.5	38	25.5	149	17.2			
Total	471	54.3	396	45.7	867	100.0			

\*Column percentages; others are row percentages

25.5% of the participants in the group of  $\geq$ 7 pregnancy number delivered less at Governmental hospital than lower numbers of pregnancy groups. The p value is 0.001.

Table.4.4.31. Distribution of women by the attendant during the last delivery and age (Nadersha Kot District-Afghanistan, 2014)

		At	tendant di	uring the	last delive	ry	
	Health personal		Others	5	Total		
Age groups	n	%	n	%	n	<b>%</b> *	p- value
≤24	61	54.0	52	46.0	113	13.0	
25-29	150	52.4	136	47.6	286	33.0	< 0.001
30-34	97	44.5	121	55.5	218	25.1	
35-39	66	53.2	58	46.8	124	14.3	
40-44	15	19.5	62	80.5	77	8.9	
45-49	7	14.3	42	85.7	49	5.7	
Total	396	45.7	471	54.3	867	100.0	

54.0% of the participants who were  $\leq 24$  years age group, delivered under the control of health personnel. Young and middle aged women delivered more under the control of health personnel than the old aged. (p=0.001).

Table.4.4.32. Distribution of women by the attendant during the last delivery andlevel of education (Nadersha Kot District-Afghanistan, 2014)

		Attendant during the last delivery						
	Health p	ersonal	Others		Total			
Level of education	n	%	n	%	n	%*	p- value	
Illiterate	286	40.7	417	59.3	703	81.1		
Literate	18	43.9	23	56.1	41	4.7		
Primary/secondary	24	72.7	9	27.3	33	3.8		
school			-				< 0.001	
High school	68	75.6	22	24.4	90	10.4		
Total	396	45.7	471	64.3	867	100.0		

\*Column percentages; others percentages

75.6% of the participants who were high secondary school graduates delivered under the control of a health personnel. Educated women delivered more under the control of the health personnel than uneducated. (p=0.001).

Table.4.4.33. Distribution of women by the attendant during the last delivery and ageat first marriage (Nadersha Kot District-Afghanistan, 2014)

		Attendant during the last delivery										
Age at first	Health personal		Othe	Others		1						
marriage	n	%	n	%	n	%	p- value					
≤16	81	37.3	136	62.7	217	25.0						
17	75	43.4	98	56.6	173	20.0	0.012					
18	115	48.9	120	51.1	235	27.1						
≥19	125	51.7	117	48.3	242	27.9						
Total	396	45.7	471	53.3	867	100.0						

51.7% of the participants at the age group of  $\geq$ 19 years at the first marriage, delivered under the control of the health personnel. When the age increased at the first marriage, women delivered more under the control of the health personnel than the ones who were married younger. The p value is 0.012.

Table.4.4.34. Distribution of women by the attendant during the last delivery and type of family (Nadersha Kot District-Afghanistan, 2014)

		Attendant during the last delivery										
Type of	Health p	personal	Othe	rs	Total							
family	n	%	n	%	n	%	p- value					
Nuclear	7	18.9	30	81.1	37	4.3						
Extended	389	46.9	441	53.1	830	95.7	< 0.001					
Total	396	45.7	471	54.3	867	100.0						

\*Column percentages; others are row percentages

46.9 % of the participants who had an extended family delivered under the control of the health personnel. The p- value is 0.001.

Table.4.4.35. Distribution of women by the attendant during the last delivery and working status (Nadersha Kot District-Afghanistan, 2014)

		Attendant during the last delivery									
	Health	personal	Others		Total						
Working status	n	%	n	%	n	⁰∕₀*	p- value				
Yes	451	58.3	323	41.7	774	89.3					
No	20	21.5	73	78.5	93	10.7	< 0.001				
Total	471	54.3	396	45.7	867	100.0					

\*Column percentages; others are row percentages

58.3 % of the participants who had a job delivered under the control of the health personnel. (p=0.001).

Self-evaluated	Attendant during the last delivery									
economical	Health personal		Others		Total					
status	n	%	n	%	n	%*	p- value			
Low	70	39.1	109	60.9	179	20.6				
Medium	150	41.2	214	58.8	364	42.0				
High	176	54.3	148	45.7	324	37.4	< 0.001			
Total	396	45.7	471	54.3	867	100.0				

Table.4.4.36. Distribution of women by the attendant during the last delivery and self-evaluated economical status (Nadersha Kot District-Af. 2014)

\*Column percentages; others are row percentages

54.3% of the participants whose self-stated economic status were high delivered under the control of the health personnel. If the self-stated economic status was better they delivered more under the control of the health personnel than women whose self-stated economic status was not good. (p=0.001).

Table.4.4.37. Distribution of women by the attendant during the last delivery and husbands' age (Nadersha Kot District-Afghanistan, 2014)

	Attendant during the last delivery									
	Health personal		Others		Total					
Husbands' age	n	%	n	%	n	%*	p- value			
≤24	32	55.2	26	44.8	58	6.7				
25-29	115	53.5	100	46.5	215	24.8				
30-34	122	46.6	140	53.4	262	30.2	0.001			
35-39	79	49.7	80	50.3	159	18.3				
40-44	30	44.1	38	55.9	68	7.8				
≥45	18	17.1	87	82.9	105	12.2				
Total	396	45.7	471	54.3	867	100.0				
55.2% of the participants whose husbands were at the age group of  $\leq 24$  years delivered under the control of the health personnel. Generally, women whose husbands were young or middle aged delivered more under the control of the health personnel than women whose husbands were older. The p value is 0.001.

Table.4.4.38. Distribution of women by the attendant during the last delivery and husbands' level of education (Nadersha Kot District-Afghanistan, 2014)

		livery					
Husbands' level of	Health	personal	Others		Total		
education	n	%	n	%	n	%	p-value
Illiterate	205	37.8	337	62.2	542	62.5	
Literate	20	30.8	45	69.2	65	7.5	
Primary/secondary	25	61.0	16	39.0	41	4.7	0.001
school							
High school/university	146	66.7	73	33.3	219	25.3	
Total	396	45.7	471	54.3	867	100.0	

\*Column percentages; others are row percentages

67.7% of the participants who were high school and university graduates delivered under the control of the health personnel. Educated women delivered more under the control of the health personnel than the lower or uneducated ones. The p value is 0.001.

Table.4.4.39. Distribution of women by the attendant during the last delivery and husbands' working status (Nadersha Kot District-Afghanistan, 2014)

		Attendant during the last delivery									
Husbands'	Health personal		Others		Tot	al					
working status	n	%	n	%	n	%	p- value				
Yes	255	39.1	397	60.9	652	75.2					
No	141	65.6	74	34.4	215	24.8	< 0.001				
Total	396	45.7	471	54.3	867	100.0					

\*Column percentages; others are row percentages

65.6% of the participants whose husbands had job delivered more under the control of the health personnel. The p-value is 0.001.

Table.4.4.40. Distribution of women by the attendant during the last delivery and number of pregnancies (Nadersha Kot District-Afghanistan, 2014)

	Attendant during the last delivery								
Number of	Health personal		Others		Total				
pregnancies	n	%	n	%	n	%	p- value		
1-2	113	60.4	74	39.6	187	21.6			
3-4	160	49.7	162	50.3	322	37.1			
5-6	98	40.7	143	59.3	241	27.8	0.001		
7-8	24	23.3	79	76.7	103	11.9			
≥9	1	7.1	13	92.9	14	1.6			
Total	396	45.7	471	54.3	867	100.0			

\*Column percentages; others are row percentages

60.8% of the participants who had 1-2 pregnancies delivered more under the control of the health personnel. If number of pregnancies were less, they delivered more under the control of the health personnel than the ones who had more pregnancies. The p value is 0.001.

Table. 4.4.41. Distribution of women by the birth attendant in the last delivery(Nadersha Kot District-Afghanistan, 2014)

Attendant during the last delivery/(n=867)	n	%	
No one	2	0.2	
Health personal	396	44.8	
Physician	190	21.5	
Nurse/ Midwife	206	23.3	
Others	469	53.0	
Traditional midwife	163	18.4	
Relatives	306	34.6	

Out of 867 participants 0.2% were not assisted by any one more than two fifth (44.8%) of 867 participants delivered under the control of the health personnel and more than one fifth (53.2%) delivered while being accompanied by relatives or friends.

Table. 4.4.42. Distribution of reason related to not giving birth at health facilities(Nadersha Kot District-Afghanistan, 2014)

Reasons	n	%
Cost (Health center is expensive)	168	35.6
Happened suddenly	109	23.2
Accessibility problem	99	21.1
Fear	4	0.8
Shame	1	0.2
Don't know	90	19.1
Total	471	100.0

More than one third (35.6%) of 471 participants had reported money problems as a barrier for giving birth at a health facility, 23.2% delivery happened suddenly, 21.1% had accessibility problem, 0.8% had fear of going to health facility, 0.2% had feeling of shame problem and 19.1% answered that they did not know about giving birth at a health facility.

## 4.5. Women future intention to use contraceptive methods

Table. 4.5.43. Distribution of women by the preferred method in the future reasonand method (Nadersha Kot District-Afghanistan, 2014)

-	Usi	ng is	Havin	ig no side	Prolo	nged		
Preferred	ea	asy	effect		effectiv	veness		
Future method	n	%	n	%	n	%	Total	% *
Oral pill	31	70.5	13	29.5	-	-	44	53.0
Injection	3	15.0	3	15.0	14	70.0	20	24.1
IUD	-	-	8	50.0	8	50.0	16	19.3
Male condom	1	33.3	2	66.7	-	-	3	3.6
Total	34	41.0	26	31.3	23	27.7	83	100.0

\*Column percentages; others are row percentages

70.5% of the participants used this method because it is easy, 29.5% used oral pill because it has no side effect, 15.0% used this method because it is easy, 15.0% used because it has no side effect and 70.0% used injection because it is effective for a long time, 50.0% used because it has no side effect and 50.0% used IUD because it is effective for a long time, 33.3% used this method because it is easy and 66.6% used male condom because has no side effect.

Intention	n	%
Yes	83	35.2
No	141	59.7
Have no idea	12	5.1
Total	236*	100.0

Table. 4.5.44. Distribution of non-user by the intention to use contraceptive methodsin the future (Nadersha Kot District-Afghanistan, 2014)

Out of 885 participants 422 knew at least one contraceptive method but 186 participants are currently using at least one modern contraceptive method and 236\* participants still didn't use any contraceptive methods. 35.2% of the participants wished to use a contraceptive method to avoid pregnancy in the future, 59.7% did not wish to use any contraceptive methods to avoid pregnancy in the future and 5.1% had no idea about using a contraceptive method in the future to avoid pregnancy.

		Future intention to use contraceptive method							
	λ	les	No		Tot	al			
Age groups	n	%	n	%	Ν	%	p- value		
≤24	18	36.0	32	64.0	50	21.2			
25-29	31	33.7	61	66.3	92	39.0			
30-34	25	44.6	31	55.4	56	23.7	0.203		
35-39	8	29.6	19	70.4	27	11.4			
≥40	1	91.1	10	90.9	11	4.7			
Total	83	35.2	153	64.8	236	100.0			

Table.4.5.45. Distribution of women by the future intention to use contraceptive method and age (Nadersha Kot District -Afghanistan, 2014)

44.6% of the 30-34 years age group participants have future intention to use family planning methods and are not currently using. In the young's and middle age groups they have more future intention to use family planning methods and are not currently using more than the old age groups. The p value is 0.203.

Table.4.5.46. Distribution of women by the future intention to use contraceptivemethod and level of education (Nadersha Kot District-Af, 2014)

	Future intention to use contraceptive method							
Level of	Yes		No Tota			al		
education	n	%	n	%	Ν	% *	p- value	
Illiterate	62	36.7	107	63.3	169	71.6		
Literate	3	27.3	8	72.7	11	4.7		
Primary/secondary	2	12.5	14	87.5	16	6.8	0.213	
school								
High secondary	16	40.0	24	60.0	40	16.9		
school								
Total	83	35.2	153	64.8	236	100.0		

\*Column percentages; others are row percentages

40.0% of the high school graduate participants had future intention to use family planning and are not currently using. (p=0.213).

Table.4.5.47. Distribution of women by the future intention to use contraceptivemethod and age at first marriage (Nadersha Kot District-Af, 2014)

	Future intention to use contraceptive method							
Age at first	Yes	5	No		Total			
marriage	n	%	n	%	Ν	% *	p- valve	
≤16	10	27.0	27	73.0	37	15.7		
17	28	50.9	27	49.1	55	23.3	0.041	
18	22	33.3	44	66.7	66	27.9		
≥19	23	29.5	55	70.5	78	33.1		
Total	83	35.2	153	64.8	236	100.0		

\*Column percentages; others are row percentages

50.9% of the 17 years age group participants had future intention to use family planning and are not currently using. The p value is 0.041.

Table.4.5.48. Distribution of women by the future intention to use contraceptivemethod and type of family (Nadersha Kot District-Afghanistan, 2014)

	Future intention to use contraceptive method							
	Yes		No		Total			
Type of family	Ν	%	Ν	%	n	% *	p- value	
Nuclear	1	14.3	6	85.7	7	2.9		
Extended	82	35.8	147	64.2	229	97.1	0.24	
Total	83	35.2	153	64.8	236	100.0		

\*Column percentages; others are row percentages

35.8% of the extended family participants had future intention to use family planning and not currently using. (p=0.24).

		Future intention to use contraceptive method								
		Yes		No	Total					
Working status	n	%	Ν	%	n	% *	p- value			
Yes	17	39.5	26	60.5	43	18.2				
No	66	34.2	127	65.8	193	81.8	0.507			
Total	83	35.2	153	64.8	236	100.0				

Table.4.5.49. Distribution of women by the future intention to use contraceptivemethod and working status (Nadersha Kot District-Af, 2014)

39.5% of the participants who had job have future intention to use family planning and are not currently using. The p value is 0.507.

Table.4.5.50. Distribution of women by the future intention to use contraceptive method and self-evaluated economical status (Nadersha Kot District-Afghanistan, 2014)

	Future intention to use contraceptive method							
Self-evaluated	Yes		No		Total			
economical	n	%	Ν	%	n	% *	p- value	
status								
Low	16	38.1	26	61.9	42	17.8		
Medium	30	31.6	65	68.4	95	40.3	0.636	
High	37	37.4	62	62.6	99	41.9		
Total	83	35.2	153	64.8	236	100.0		

\*Column percentages; other are row percentages

38.1% of the low self-stated economic status participants had future intention to use family planning method and are not currently using. The p value is 0.636.

		Future intention to use contraceptive method								
Husbands'	Ye	es	No		Total					
age	n	%	n	%	n	% *	p- value			
24	9	31.0	20	69.0	29	12.3				
25-29	34	43.0	45	57.0	79	33.5				
30-34	23	34.8	43	65.2	66	28.0	0.259			
35-39	14	31.8	30	68.2	44	18.6				
40	3	16.7	15	83.3	18	7.6				
Total	83	35.2	153	64.8	236	100.0				

Table.4.5.51. Distribution of women by the future intention to use contraceptivemethod and husbands' age (Nadersha Kot District-Af, 2014)

Of the participants age group 25-29 years husbands about 43.0% had Future intention to use family planning and are not currently using. The p value is 0.259.

Table.4.5.52. Distribution of women by the future intention to use contraceptive method and husbands' level of education (Nadersha Kot District-Afghanistan, 2014)

	Future intention to use contraceptive method						
Husbands' level of	Yes		No T		Total		
education	n	%	n	%	Ν	% *	p- value
Illiterate	40	31.7	86	68.3	126	53.4	
Literate	7	38.8	12	63.2	19	8.1	
Primary/secondary	7	50.0	7	50.0	14	5.9	0.526
school							
High school/university	29	37.7	48	62.3	77	32.6	
Total	83	35.2	153	64.8	236	100.0	

\*Column percentages; others are row percentages

50.0% of the participants, whose husbands were Primary and Secondary school graduate, knew Future intention to use family planning and are not currently using. The p value is 0.526.

Table.4.5.53. Distribution of women by the future intention to use contraceptive method and husbands' working status (Nadersha Kot District-Afghanistan, 2014)

		Future intention to use contraceptive method							
Husbands'	Yes		No		Total				
working status	Ν	%	n	%	Ν	% *	p- value		
Yes	28	36.8	48	63.2	76	32.2			
No	55	34.4	105	65.6	160	67.8	0.711		
Total	83	35.2	153	64.8	236	100,0			

\*Column percentages; others are row percentages

36.8% of the participants, whose husbands had job, knew Future intention to use family planning and are not currently using. (p=0.711).

Table.4.5.54. Distribution of women by the future intention to use contraceptive method and number of pregnancies (Nadersha Kot District-Afghanistan, 2014)

	Future intention to use contraceptive method								
Number of	Yes		No		Tota	l			
Pregnancies	n	%	n	%	n	% *	p- valve		
1-2	19	29.7	45	70.3	64	27.2			
3-4	44	50.6	43	49.4	87	36.8			
5-6	19	33.9	37	66.1	56	23.7	0.001		
≥7	1	3.4	28	96.6	29	12.3			
Total	83	35.2	153	64.8	236	100.0			

\*Column percentages; others are row percentages

50.6% of the 3-4 numbers of pregnancy groups' participants, knew Future intention to use family planning and are not currently using. The p value is 0.001.

Reason for not using	n	%
No need for using FP method	94	51,1
Opposition of the husband	44	23.9
Want to have a child	29	15.8
Health facility is too far	17	9.2
Total	184	100.0

Table. 4.5.55. Reasons for not using any family planning method (Nadersha Kot District-Afghanistan, 2014)

One half (51.1%) of the participants answered that they do not need to use any contraceptive methods, 23.9% answered as opposition of husband, 15.8% intention to have a child and 9.2% answered that the health center is too far.

## 4.6. Knowledge and source of women about contraceptive method

Table. 4.6.56. Distribution of source of knowledge by method (Nadersha Kot

District-Afghanistan, 2014)

Source of knowledge										
Method	Health worker		Frie	Friends		edia	То	tal		
known	n	%	n	%	Ν	%	n	%		
Oral pill	190	45.4	164	39.1	65	15.5	419	100.0		
Injection	210	50.7	146	35.3	58	14.0	414	100.0		
Male condom	205	61.2	119	35.5	11	3.3	335	100.0		
IUD	141	71.6	38	19.3	18	9.1	197	100.0		
Tubal ligation	5	71.4	2	28.6	-	-	7	100.0		

More than two fifth (45.4%) Oral pill of 867 participant were learnt from health worker and more than half (54.6%) of above mentioned participants learnt from media or friends. Half (50.7%) injectables of 867 participants were learnt from health worker and 49.3% were learnt from friends or media. Less than two third (61.2%) male condom of 867participants were learnt from health worker and more than one third (38.8%) from friends or media. 71.6% of the 867 participants learnt IUD method from health worker, 28.4% learnt from friends and tubal ligation 71.4% were learnt from health worker and 28.6% from friends.

Table. 4.6.57. Distribution of women by the knowledge and ever use of family

planning services offered in the residential area (Nadersha Kot District-Afghanistan, 2014)

Knowledge and ever use	n	%
Yes	390	44.1
No	495	55.9
Total	885	100.0

More than two fifth (44.1%) of participants obtained knowledge or ever-use of family planning services offered in the residential area.

Table. 4.6.58. Distribution of women by age and knowledge about contraceptivemethods (Nadersha Kot District-Afghanistan, 2014)

Knowledge about contraceptive method									
Women age	Yes		No		Total				
Group	n	%	n	%	n	%	p-value		
≤19	5	41.7	7	58.3	12	1.4			
20-24	65	58.0	47	42.0	112	12.6	< 0.001		
25-29	153	52.8	137	47.2	290	32.8			
30-34	110	49.8	111	50.2	221	24.9			
35-39	63	50.8	61	49.2	124	14.1			
40-44	18	23.4	59	76.6	77	8.7			
45-49	8	16.3	41	83.7	49	5.5			
Total	442	47.7	463	52.3	885	100.0			

\* Column percentages; others are row percentages

Generally between  $\leq 19$  and 39 years 41.7%, 58.0% and from 40 to 49 years the knowledge about contraceptive method is decreasing, 40-44 years 23.4% and 45-49 years 16.3%. Family planning methods. The p value is 0.001 it is significant.

	Knowledge about contraceptive method							
	Yes		No		Total			
Education level	n	%	Ν	%	n	% *	p- value	
Illiterate	279	39.0	437	61.0	716	80.9		
Literate	24	57.1	18	42.9	42	4.8		
Primary school	8	80.0	2	20.0	10	0.1	< 0.001	
Secondary school	24	100.0	-	0.0	24	2.7		
High secondary school	87	93.5	6	6.5	93	10.5		
Total	422	47.7	463	52.3	885	100.0		

Table.4.6.59. Distribution of women by knowledge about contraceptive methods and<br/>education level (Nadersha Kot District -Afghanistan, 2014)

More than one third (39.0%) of the participants were illiterate, 57.1% literate, primary school graduate 80.0%, secondary school graduate 100.0%, high school graduate 93.5% knew at least one contraceptive methods. P-value is 0.001. It is significant.

Table.4.6.60. Distribution of women by knowledge about contraceptive methods andage at first marriage (Nadersha Kot District-Afghanistan, 2014)

Knowledge about contraceptive method										
Age at first	Yes		N	No		tal	p- value			
marriage	n	%	n	%	n	% *				
≤16	82	37.4	137	62.6	219	24.8				
17	84	47.7	92	52.3	176	19.8	< 0.01			
18	117	48.5	124	51.5	241	27.2				
≥19	139	55.8	110	44.2	249	28.2				
Total	422	47.7	463	52.3	885	100.0				

\*Column percentages; other are row percentages

About 37.4% of the participants in the age group  $\leq 16$  years, 47.7% in the 17 years age, in the age 18 years in the age group  $\geq 19$  years 58.8% knew about one

or more of contraceptive methods. The P value is 0.01. The p-value is less than  $\alpha$  value (p=0.01, p-value is statistically significant).

Table.4.6.61. Distribution of women by knowledge about contraceptive methods andtype of family (Nadersha Kot District-Afghanistan, 2014)

	Knowledge about contraceptive method									
	Yes		No		Total					
Type of family	n	%	n	%	n	%	p- value			
Nuclear family	10	27.0	27	73.0	37	4.2				
Extended family	412	48.6	436	51.4	848	95.8	< 0.01			
Total	422	47.7	463	52.3	885	100.0				

\*Column percentages; others are row percentages

48.6% of the extended family participants knew family planning methods. The p value is 0.01 and it is statistically significant.

Table.4.6.62. Distribution of women by knowledge about contraceptive methods and working status (Nadersha Kot District-Afghanistan, 2014)

Knowledge about contraceptive method									
		Yes No Total							
Working status	Ν	%	n	%	n	% *	p-value		
Yes	90	93.8	6	6.2	96	10.8	< 0.001		
No	332	42.1	457	57.9	789	89.2			
Total	422	47.7	463	52.3	885	100.0			

\*Column percentages; others are row percentages

93.8% of the participants who had job knew more about family planning methods than who did not have a job. The p value is 0.001.

Self-evaluated		Knowledge about contraceptive method								
economical	Y	es	Ν	No	Т	otal				
status	n	%	n	%	Ν	% *	p- value			
Low	62	34.3	119	65.7	181	20.4				
Medium	182	48.5	193	51.5	375	42.4	< 0.001			
High	178	54.1	151	45.9	329	37.2				
Total	422	47.7	463	52.3	885	100.0				

Table.4.6.63. Distribution of women by knowledge about contraceptive methods and self-evaluated economical status (Nadersha Kot District-Af, 2014)

54.1% of all participants whose self-stated economic status were better, knew more about family planning methods than whose self-stated economic status were not better. The p value is 0.001.

Table.4.6.64. Distribution of women by knowledge about contraceptive methods and husbands' age (Nadersha Kot District-Afghanistan, 2014)

	Knowledge about contraceptive method								
	Y	es	١	No	To	otal			
Husband's age	n	%	Ν	%	Ν	% *	p-value		
≤24	36	54.5	30	45.5	66	7.4			
25-29	130	59.1	90	40.9	220	24.9			
30-34	118	44.4	148	55.6	266	30.1			
35-39	87	54.4	73	45.6	160	18.1	< 0.001		
40-44	34	50.0	34	50.0	68	7.7			
45-49	16	17.2	77	82.8	93	10.5			
≥50	1	8.3	11	91.7	12	1.3			
Total	422	47.7	463	52.3	885	100.0			

\*Column percentages; others are row percentages

59.1% of all participants, husbands from 25-29 years, knowledge about family planning methods more than the ones who were in the young's and in the old age. Generally, the ones whose husbands were in the middle age-knew more than the ones whose husbands were in the young's and old aged group. The p value is 0.001.

Knowledge about contraceptive method											
Husbands' level of	Y	es	No		To	tal					
education	n	%	n	%	n	% *	p- value				
Illiterate	206	37.2	348	62.8	554	62.6					
Literate	23	34.3	44	65.7	67	7.6					
Primary school	20	80.0	5	20.0	25	2.8	< 0.001				
Secondary school	9	56.2	7	43.8	16	1.8					
High secondary school	152	72.7	57	27.3	209	23.6					
University	12	85.7	2	14.3	14	1.6					
Total	422	47.7	463	52.3	885	100.0					

Table.4.6.65. Distribution of women by knowledge about contraceptive methods and husbands' level of education (Nadersha Kot District-Af, 2014)

85.7% of all participants, whose husbands were university graduate, knew more about family planning methods than the ones whose husbands were less educated or uneducated. Generally, the ones whose husbands were educated had more knowledge than the ones whose husbands were uneducated about family planning methods. The p value is 0.001.

Table.4.6.66. Distribution of women by knowledge about contraceptive methods and husbands' working status (Nadersha Kot District-Afghanistan, 2014)

Knowledge about contraceptive method										
Husbands' working		Yes	N	lo	То	tal				
status	n	%	n	%	n	% *	p-value			
Yes	159	72.6	60	27.4	219	24.8	< 0.001			
No	263	39.5	403	60.5	666	75.2				
Total	422	47.7	463	52.3	885	100.0				

\*Column percentages; others are row percentages

72.6% of all participants whose husbands had a job knew more about family planning methods than the ones whose husbands did not have jobs. P value is 0.001.

Number of	Knowledge about contraceptive method							
pregnancies	Y	Yes		No		otal		
	n	%	n	%	n	% *	p- value	
1-2	104	62.3	63	37.7	167			
3-4	157	52.7	141	47.3	298	24.9		
5-6	110	43.5	143	56.5	253	30.1	< 0.001	
7-8	34	30.6	77	69.4	111	18.1		
≥9	17	30.4	39	69.6	56	7.7		
Total	422	47.7	463	52.3	885	100.0		

Table.4.6.67. Distribution of women by knowledge about contraceptive methods and number of pregnancies Nadersha Kot District-Afghanistan, 2014)

62.3% of all participants, 1-2 numbers of pregnancy, knew more about family planning methods. Generally, the ones who had less children knew more about family planning methods than the ones who had more children. The p value is 0.001.

Table. 4.6.68. Distribution of women by knowledge about contraceptive method andplace of last delivery (Nadersha Kot District- Afghanistan, 2014)

	Knowledge about contraceptive method								
Place of the last		No		Yes	Тс	otal			
delivery	n	%	n	%	n	% *	p-value		
At home	325	69.0	146	31.0	471	54.3	< 0.001		
At hospital	130	32.8	266	67.2	396	45.7			
Total	455	52.5	412	47.5	867	100.0			

\*Column percentages; others are row percentages

67.2% of the participants delivered at hospital and 31.0% delivered at home. The p value is 0.001.

	Knowledge about contraceptive method									
Attendant of last		No	Y	es	Т	otal				
delivery	n	%	n	%	n	% *	p-value			
Others	325	69.0	146	31.0	471	54.3				
Health personal	130	32.8	266	67.2	396	45.7	< 0.001			
Total	455	52.5	412	47.6	867	100.0				

Table. 4.6.69. Distribution of women by knowledge about contraceptive methods andattendant of last delivery (Nadersha Kot District- Afghanistan, 2014)

More than two third (67.2%) of the participants' last birth were attended by health personal. The p value is 0.001.

Table.4.6.70. Distribution of women by the Knowledge about family planning services in the residential area and age (Nadersha Kot District-Afghanistan, 2014)

	Knowledge about family planning services in the residential area								
	Yes		No		Total				
Age groups	n	%	Ν	%	n	% *	p- value		
≤24	66	53.2	58	46.8	124	14.1			
25-29	144	49.7	146	50.3	290	32.8	< 0.001		
30-34	103	46.6	118	53.4	221	24.9			
35-39	58	46.8	66	53.2	124	14.1			
40-44	14	18.2	63	81.8	77	8.7			
45-49	5	10.2	44	89.8	49	5.4			
Total	390	44.1	495	55.9	885	100.0			

\*Column percentages; others are row percentages

53.2% of the participants' age group  $\leq 24$  years had knowledge about family planning services in the residential area. Gradual knowledge about family planning services in the residential area from lower age groups was higher than old age groups. The p value is 0.001.

Table.4.6.71. Distribution of women by the Knowledge about family planning services in the residential area and level of education (Nadersha Kot District-Afghanistan, 2014)

	Knowledge about family planning services in the residential										
	area	area									
	Yes	Yes No Total									
Level of education	n	%	Ν	%	n	% *	p- value				
Illiterate	249	34.8	467	65.2	716	81.0					
Literate	24	57.1	18	42.9	42	4.7					
Primary/secondary school	32	94.1	2	5.9	34	3.8	< 0.001				
High secondary school	85	91.4	8	8.6	93	10.5					
Total	390	44.1	495	55.9	885	100.0					

94.1% of the participants, Primary and Secondary school graduates, had knowledge about family planning services in the residential area. Educated were more than uneducated. (p=0.001).

Table.4.6.72. Distribution of women by the Knowledge about family planning services in the residential area and age at first marriage (Nadersha Kot District- Afghanistan, 2014)

	Knowledge about family planning services in the residential area									
Age at first	Yes		No		Tota	l				
marriage	n	%	Ν	%	n	%	p- value			
≤16	76	37.7	143	65.3	219	24.7				
17	75	42.6	101	57.4	176	20.0	0.002			
18	108	44.8	133	55.2	241	27.2				
≥19	131	52.6	118	47.4	249	28.1				
Total	390	44.1	495	55.9	885	100.0				

\*Column percentages; others are row percentages

Of the participants age group at the first marriage  $\geq 19$  years, about 52.6% had knowledge about family planning services in the residential area. Gradually knowledge about family planning services in the residential area increased from  $\leq 16$ to 18 age group. The p value is 00.002.

Table.4.6.73. Distribution of women by the Knowledge about family planning services in the residential area and type of family (Nadersha Kot District-Afghanistan, 2014)

	Knowledge about family planning services in the residential area									
	Yes		No	Total	l					
Type of family	n	%	Ν	%	n	% *	p- value			
Nuclear	9	24.3	28	75.7	37	4.2				
Extended	381	44.9	467	55.1	848	95.8	0.013			
Total	390	44.1	495	55.9	885	100.0				

\*Column percentages; others are row percentages

44.9% of the extended family participants had knowledge about family planning services in the residential area. The p value is 0.013.

Table.4.6.74. Distribution of women by the Knowledge about family planning services in the residential area and working status (Nadersha Kot District-Afghanistan, 2014)

	Know	Knowledge about family planning services in the residential area										
	Ye	Yes No Total										
Working status	n	%	Ν	%	n	% *	p- value					
Yes	88	91.7	8	8.3	96	10.8	< 0.001					
No	302	38.3	487	61.7	789	89.2						
Total	390	44.1	495	55.9	885	100.0						

\*Column percentages; others are row percentages

91.7% of the participants who had job had knowledge about family planning services in the residential area. (p=0.001).

Table.4.6.75. Distribution of women by the Knowledge about family planning services in the residential area and self-evaluated economical status (Nadersha Kot District-Afghanistan, 2014)

	Knowledge about family planning services in the residential area									
Self-evaluated	Yes	5	N	0	Tota	1				
economical	n	%	Ν	%	n	% *	p- value			
status										
Low	56	30.9	125	69.1	181	20.4				
Medium	169	45.1	206	54.9	375	42.4	< 0.001			
High	165	50.2	164	49.8	329	37.2				
Total	390	44.1	495	55.9	885	100.0				

50.2% of the high self-stated economic status participants had knowledge about family planning services in the residential area. Generally the participants with better economic statuses knew more than the ones with no better economic status. The p value is 0.001.

Table.4.6.76. Distribution of women by the Knowledge about family planning services in the residential area and husbands' age (Nadersha Kot District-Afghanistan, 2014)

	Knowledge about family planning services in the residential are									
	Yes		No		Tota	ıl				
Husbands' age	n	%	Ν	%	n	% *	p- value			
≤24	35	53.0	31	47.0	66	7.5				
25-29	122	55.5	98	44.5	220	24.8	< 0.001			
30-34	110	41.4	156	58.6	266	30.1				
35-39	80	50.0	80	50.0	160	18.1				
40-44	32	47.1	36	52.9	68	7.7				
≥45	11	10.5	94	89.5	105	11.8				
Total	390	44.1	495	55.	885	100.0				

\*Column percentages; others are row percentages

55.5% of the 25-29 age group of husband's participants had knowledge about family planning services in the residential area. The ones whose husbands were in the young's and middle age groups knew more than old age groups. The p value is 0.001.

Table.4.6.77. Distribution of women by the Knowledge about family planning services in the residential area and husbands' level of education (Nadersha Kot District-Afghanistan, 2014)

	Knowled	Knowledge about family planning services in the residential area									
Husbands' level	Yes		No		Total						
of education	Ν	%	Ν	%	n	% *	p- value				
Illiterate	188	33.9	366	66.1	554	62.6					
Literate	21	31.3	46	68.7	67	7.6	0.001				
Primary/	29	70.7	12	29.3	41	4.6					
secondary school											
High	152	68.2	71	31.8	223	25.2					
school/university											
Total	390	44.1	495	55.9	885	100.0					

\*Column percentages; others are row percentages

70.7% of the participants, whose husbands were Primary and Secondary school graduate, had knowledge about family planning services in the residential area. The p value is 0.001.

Table.4.6.78. Distribution of women by the Knowledge about family planning services in the residential area and husbands' working status (Nadersha Kot District-Afghanistan, 2014)

	Knowled	Knowledge about family planning services in the residential area									
Husbands'	Yes		No		Total						
working status	n	%	Ν	%	n	% *	p- value				
Yes	148	67.6	71	32.4	219	24.7					
No	242	36.3	424	63.7	666	75.3	< 0.001				
Total	390	44.1	495	55.9	885	100.0					

67.6% of the participants, whose husbands had job, had knowledge about family planning services in the residential area. (p=0.001).

Table.4.6.79. Distribution of women by the Knowledge about family planning services in the residential area and number of pregnancies (Nadersha Kot District-Afghanistan, 2014)

	Knowledge about family planning services in the residential area									
Number of	Yes		No		Total					
Pregnancies	n	%	Ν	%	n	% *	p- value			
1-2	99	59.3	68	40.7	167	18.9				
3-4	148	49.7	150	50.3	298	33.7	< 0.001			
5-6	99	39.1	154	60.9	253	28.6				
≥7	44	26.3	123	73.7	167	18.8				
Total	390	44.1	495	55.9	885	100.0				

\*Column percentages; others are row percentage

59.3% of the participants, 1-2 numbers of pregnancy group, had knowledge about family planning services in the residential area. Gradually less numbers of pregnancy groups knew more than the groups of pregnancy numbers. The p value is 0.001.

## 4.7. Family planning knowledge, ever and current use of contraceptive

		Kn	owledge				Ever use		Current use		
	Out all w	of omen	Out of women who knew at least a method		Out of all Out of women   Women who knew at   least one   method		n C	Dut o wo	of all omen	Out of women who knew at least one method	
	n	%		%	N	%	%		n	%	%
No	463	52.3			679	76.7	68.2	6	599	79.0	66.2
Yes	422	47.7			206	23.3	48.6*	1	86	21.0	44.1**
Oral pill	419	47.2	99.3		69	7.8	33.5		59	6.7	31.7
Injection	414	46.8	98.1		62	7.0	30.1		57	6.4	30.6
Male	335	37.9	79.4		38	4.3	18.4		36	4.1	19.4
condom											
IUD	197	23.3	46.7		35	4.0	17.0		32	3.6	17.2
Tubal	7	0.8	1.7		2	0.2	1.0		2	0.2	1.1
ligation											

Table.4.7.80. Distribution of women by knowledge ever use and current use of modern contraceptive methods (Nadersha Kot District-Afghanistan, 2014)

 $\ast 48.3\%$  of participants out of women who knew at least one method were ever used contraceptive method

\*\*44.1% of participants who knew at least one method were currently using contraceptive method

Out of 7 women, who knew Tubal ligation, 2 were currently using this method. 52.3% of the participants did not know any contraceptive method, 47.7% knew at least one method of contraceptives. Out of all women, the most common used method was pill 7.8%, followed by injectables 7.0%, male condom 4.3, IUD 4.0% and tubal ligation was used just 0.2%. 33.5% ever and 31.7% currently used of oral pill, 30.1% ever and 30.6% currently used injectables, 18.4% ever and 19.4% currently used male condom and 17.0% ever and 17.2% currently used IUD of women who knew at least one contraceptive method.

Reason	Oral pill		Injection		IUD		Male condom	
	n	%	n	%	n	%	n	%
Using is easy	48	81.3	33	57.9	2	5.5	12	37.5
Having no side effect	11	18.7	17	29.8	22	61.2	20	62.5
prolonged effect	-	-	7	12.3	12	33.3	-	-
Total	59	100.0	57	100.0	36	100.0	32	100.0

Table 4.7.81. Distribution of reasons using a contraceptive method by the type ofmethod (Nadersha Kot District-Afghanistan, 2014)

Of the participants 81.3%, oral pill was used that using is easy in the others method the percentages were less than pill, less than two third (61.2%) IUD of participants were used that having no side effect the others method were less used than it and one third or more than it (33.3%) IUD was used by participants that were prolonged time effective.

Table.4.7.82. Distribution of women by ever use of contraceptive methods and age (Nadersha Kot District-Afghanistan, 2014)

		Ever					
-		Never	E	lver	Т	otal	
-	n	%	n	%	n	%*	p-value
Age group							
≤19	12	100.0	-	-	12	1.3	
20-24	91	81.2	21	18.8	112	12.6	
25-29	221	76.2	69	23.8	290	32.8	
30-34	161	72.9	60	27.1	221	25.0	< 0.001
35-39	83	66.9	41	33.1	124	14.1	
40-44	66	85.7	11	14.3	77	8.7	
45-49	45	91.8	4	8.2	49	5.5	
Total	679	76.7	206	23.3	885	100.0	

\*Column percentage; others are row percent

Of the participants  $\leq 19$  years old did not use any family planning methods, 35-39 years old 33.1%, ever used any family planning methods, and also the middle

age more ever used any family planning methods than in the young's and old aged groups. The value is p=0.001.

			E	ver-use			
	Ne	ver	Ev	ver	Tota	ıl	
Educational status	Ν	%	n	%	n	% *	p- value
Illiterate	596	83.2	120	16.8	716	80.0	
Literate	28	66.7	14	33.3	42	5.0	
Primary school graduate	6	60.0	4	40.0	10	1.1	<0.001
Secondary school graduate	11	45.8	13	54.2	24	2.7	
High secondary school graduate	38	40.9	55	59.1	93	10.5	
Total	679	76.7	206	23.3	885	100.0	

Table.4.7.83. Distribution of women by ever use of contraceptive methods and<br/>educational status (Nadersha Kot District-Afghanistan, 2014)

\*Column percentages; others are row percentages

59.1% of the participants used more any family planning methods and generally the educated used more any family planning methods than less or uneducated. The p valve is 0.001.

			E	Ever-use			
Age at first		Never	E	lver	Tot	al	
marriage	n	%	Ν	%	n	% *	p- value
≤16	172	78.5	47	21.5	219	24.8	
17	142	80.7	34	19.3	176	19.8	
18	185	76.8	56	23.2	241	27.3	< 0.001
≥19	180	72.3	69	27.7	249	28.2	
Total	679	76.7	206	23.3	885	100.0	

Table.4.7.84. Distribution of women by ever use of contraceptive methods and age at first marriage (Nadersha Kot District-Afghanistan, 2014)

Of the participants from  $\geq 19$  years 27.7% used more any family planning methods than the lower age groups. (P=0.001).

Table.4.7.85. Distribution of women by ever use of contraceptive methods and type of family (Nadersha Kot District-Afghanistan, 2014)

		Ever-use							
		Never	E	Ever	Т	otal			
Type of family	Ν	%	n	%	n	%	P value		
Nuclear family	34	91.9	3	8.1	37	4.2			
Extended family	645	76.1	203	23.9	848	95.8	< 0.02		
Total	679	76.7	206	23.3	885	100.0			

\*Column percentages; others are row percentages

Of the participants 23.9% were used any family planning methods extended family. The p valve is 0.02.

	Ever-use									
Working	Ne	ever use	Eve	er use	Т	otal				
status	n	%	n	%	n	% *	p- value			
Yes	126	57.5	93	42.5	219	24.7				
No	553	83.0	113	17.0	666	75.3	< 0.02			
Total	679	76.7	206	23.3	885	100.0				

Table.4.7.86. Distribution of women by ever use of contraceptive method and<br/>working status (Nadersha Kot District-Afghanistan, 2014)

42.5% of all participants who had job ever used any family planning methods. The p value is 0.02.

Table.4.7.87. Distribution of women by ever use of contraceptive methods and selfevaluated economical status (Nadersha Kot District-Af, 2014)

	Ever-use									
Self-evaluated	1	Never	E	ver	Т	otal				
economical status	Ν	%	n	%	n	% *	p- value			
Low	159	87.8	22	12.2	181	20.4				
Medium	279	74.4	96	25.6	375	42.4	< 0.001			
High	241	73.3	88	26.7	329	37.2				
Total	679	76.7	206	23.7	885	100.0				

\*Column percentages; others are row percentages

26.7% of all participants with better economic status ever used more any family planning methods than the ones with low or medium economic status. The p value is 0.001.

	Ever-use							
	Never		Ever		Total			
Husbands' age	n	%	N	%	n	%	p- value	
≤24	58	87.9	8	12.1	66	7.4		
25-29	163	74.1	57	25.9	220	24.8		
30-34	207	77.8	59	22.2	266	30.1		
35-439	113	70.6	47	29.4	160	18.1	< 0.001	
40-44	43	63.2	25	36.8	68	7.7		
45-49	84	90.3	9	9.7	93	10.5		
≥50	11	91.7	1	8.3	12	1.4		
Total	679	76.7	206	23.3	885	100.0	0.00	

Table.4.7.88. Distribution of women by ever use of contraceptive methods and husbands' age (Nadersha Kot District-Afghanistan, 2014)

9.7% of the participants age group  $\geq$ 50 years and the age group 45-49 years 8.3% ever used any family planning methods less than the young's and middle aged. (p=0.001).

Table.4.7.89. Distribution of women by ever use of contraceptive methods and husbands' educational status (Nadersha Kot District-Af, 2014)

	Ever-use							
Husbands' educational	Never		Ever		Total			
status	n	%	Ν	%	n	% *	p- value	
Illiterate	468	84.5	86	15.5	554	62.6		
Literate	60	89.6	7	10.4	67	7.6		
Primary school	16	64.0	9	36.0	25	2.8	< 0.001	
Secondary school	9	56.2	7	43.8	16	1.8		
High secondary school	121	57.9	88	42.1	209	23.6		
University	5	35.7	9	64.3	14	1.6		
Total	679	76.7	206	23.3	885	100.0		

\*Column percentages; others row percentages

15.5% of the illiterate husbands participants ever used any family planning methods, 64.3% ever used any family planning methods, whose husbands were more educated than they were ever used more any family planning methods. (p=0.001).

Table.4.7.90. Distribution of women by ever use of contraceptive methods and husbands' working status (Nadersha Kot District-Afghanistan, 2014)

	Ever-use								
Husbands' working	Never		Ever	Ever T			'otal		
status	n	%	Ν	%	n	% *	p-value		
Yes	126	57.5	93	42.5	219	24.7			
No	553	83.0	113	17.0	666	75.3	< 0.001		
Total	679	76.7	206	23.3	885	100.0			

\*Column percentages; others are row percentages

42.5% of the participants whose husbands had job ever used any family planning methods more than the ones whose husbands did not have jobs. The p value is 0.001.

Table.4.7.91. Distribution of women by ever use of contraceptive methods andnumber of pregnancies (Nadersha Kot District-Afghanistan, 2014)

	Ever -use								
	Nev	er	Ever		T	otal			
Number of pregnancies	n	%	n	%	n	% *	p- value		
1-2	122	73.1	45	26.9	167	18.8			
3-4	220	73.8	78	26.2	298	33.7			
5-6	194	76.7	59	23.3	253	28.6	< 0.008		
7-8	90	81.1	21	18.9	111	12.6			
≥9	53	94.6	3	5.4	56	6.3			
Total	679	76.7	206	23.3	885	100.0			

\*Column percentages. Others are row percentages

Of the participants number of pregnancies group  $\geq 9$  whose numbers of pregnancy were less ever used any family planning methods, they-ever used any

family planning methods more than the ones whose numbers of pregnancy were more. (p=0.008).

Table. 4.7.92. Distribution of women by ever use of contraceptive methods and placeof last delivery (Nadersha Kot District- Afghanistan, 2014)

Place of the last							
birth	Never		Ever		Total		
	n	%	n	%	n	% *	p- value
At home	413	87.7	58	12.3	471	54.3	
At hospital	248	62.6	148	37.4	396	45.7	< 0.001
Total	611	76.2	206	23.8	867	100.0	

\*Column percentages; other are row percentages

37.4% of the participants were delivered to a hospital whose delivered at the hospital they were more used contraceptive any methods. The p value is 0.001

Table. 4.7.93. Distribution of women by ever use of contraceptive methods and<br/>attendant of the delivery (Nadersha Kot District- Afghanistan, 2014)

	Ever-use									
Attendant of last	Ne	ver	Eve	er	Тс	otal				
delivery	n	%	n	%	n	% *	p-value			
Others	413	87.7	58	12.3	471	54.3				
Health personal	248	62.6	148	37.4	396	45.7	< 0.001			
Total	661	76.2	206	23.8	867	100.0				

\*Column percentages; other are row percentages

Among the participants, more than one third (37.4%) were attended last birth by health personal. (p=0.001).

Willing to change	Oral pill		Inje	ection	Ι	U <b>D</b>	Male condom	
the current method	(n=59)		(n=57)		(n=	=36)	(n=32)	
and reasons	n	%	n	%	n	%	n	%
No	31	52.5	39	68.4	28	77.8	25	78.1
Yes	28	47.5	18	31.6	8	22.2	7	21.9
Difficult to use	22	37.3	6	10.6	7	19.5	7	21.9
Abnormal vaginal bleeding	6	10.2	12	21.0	1	2.7	-	-

Table,4.7.94. Distribution of women by the willing to change the current method and the reasons (Nadersha Kot District-Afghanistan, 2014)

One half (52.5%) of the participants did not wish to change the current method of oral pill, 68.4% did not wish to change the current method of injection, 77.8% did not wish to change the current method of IUD and 78.1%-did not wish to change the current method of oral pill, from this percentage 37.3% wished to change due to difficulty of using and 10.2% of abnormal vaginal bleeding, 31.6% wished to change the current method of injection from this injection percentage 10.6% wish to change due to difficult to use and 21.0% abnormal vaginal bleeding , 22.2% wished to change the current method of IUD from this percentage 19.5% wished to change due to difficulty of using and 2.7% were wish to change due to abnormal vaginal bleeding, 21.9% wished to change the current method of male condom from this percentage 21.9% were wish to change due to difficulty of using and 2.7% were wish to change due to from this percentage 21.9% were wish to change due to difficulty of using and 2.7% were wish to change due to from this percentage 21.9% were wish to change due to difficulty of using and 2.7% were wish to change due to from this percentage 21.9% were wish to change due to difficulty of using and 2.7% were wish to change due to difficulty of using and 2.7% were wish to change due to difficulty of using and 2.7% were wish to change due to difficulty of using and 2.7% were wish to change due to difficulty of using and 2.7% were wish to change due to difficulty of using and 2.7% were wish to change due to difficulty of using the current method of male condom from this percentage 21.9% were wish to change due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty of using due to difficulty due to difficulty due to due to d

	Currently r	not using	Current	ly using	Т	otal	
Age groups	n	%	n	%	n	% *	p- value
≤19	12	100.0	-	_	12	1.3	
20-24	92	82.1	20	17.9	112	12.6	
25-29	229	79.0	61	21.0	290	32.8	
30-34	167	75.6	54	24.4	221	25.0	0.009
35-39	88	71.0	36	29.0	124	14.1	
40-44	66	85.7	11	14.3	77	8.7	
45-49	45	91.8	4	8.2	49	5.5	
Total	699	79.0	186	21.0	885	100.0	

Table.4.7.95. Distribution of women by current use of contraceptive methods and age (Nadersha Kot District-Afghanistan, 2014)

Of the participants from  $\leq 19$  years did not currently use any family planning methods, but 35-39 years, 29.0%, currently used any family planning methods more than other age groups, generally in the middle age currently are using more than the ones in the older and younger age group. The p value is 0.009.

Table.4.7.96. Distribution of women by current use of contraceptive methods andlevel of education (Nadersha Kot District-Afghanistan, 2014)

		Curre	ent use	of contra	ceptive	method	
	Current	ly not	Currer	ntly			
	using		using		To	otal	
Level of education	n	%	n	%	n	% *	p- value
Illiterate	606	84.6	110	15.4	716	80.9	
Literate	29	69.0	13	31.0	42	4.8	
Primary school	6	60.0	4	40.0	10	1.1	< 0.001
Secondary school	12	50.0	12	50.0	24	2.7	
High secondary school	46	49.5	47	50.5	93	10.5	
Total	699	79.0	186	21.0	885	100.0	

\*Column percentages; others are row percentages

50.5% of the participants, who were more educated, were more current user of any family planning methods. They currently used more any family planning methods than the ones who were low or uneducated. (p=0.001).

Table.4.7.97. Distribution of women by current use of contraceptive methods and age at first marriage (Nadersha Kot District-Afghanistan, 2014)

	Current use of contraceptive method									
Age at first	Currently	not using	Current	ly using	Т	otal				
marriage	n	%	n	%	n	% *	p- value			
≤16	174	79.5	45	20.5	219	24.7				
17	147	83.5	29	16.5	176	19.9				
18	190	78.8	51	21.2	241	27.2	0.25			
≥19	188	75.5	61	24.5	249	28.2				
Total	699	79.0	186	21.0	885	100.0				

\*Column percentages; others are row percentages

About 24.5% of the participants age group  $\geq 19$  years currently used any family planning methods more than lower age groups at the first marriage. The p value is 0.25. Actually there is no difference in the currently used any family planning methods among the first age of marriage groups.

Table.4.7.98. Distribution of women by current use of contraceptive methods andtype of family (Nadersha Kot District-Afghanistan, 2014)

	Current use of contraceptive method								
	Currently not using		Currently	using	Т	otal			
Type of family	n	%	n	%	n	% *	p- value		
Nuclear family	34	91.9	3	8.1	37	4.2			
Extended family	665	78.4	183	21.6	848	95.8	0.04		
Total	699	79.0	186	21.0	885	100.0			

\*Column percentages, others are row percentages

21.6% of the extended family participants currently used any family planning methods. The p value is 0.04.

Table.4.7.99. Distribution of women by current use of contraceptive methods and working status (Nadersha Kot District-Afghanistan, 2014

	Current use of contraceptive method								
	Currently not using		Currently using		Total				
Working status	n	%	n	%	n	% *	p- value		
Yes	49	51.0	47	49.0	96	10.8			
No	650	82.4	139	17.6	789	89.2	< 0.001		
Total	699	79.0	186	21.0	885	100.0			

\*Column percentages; others are row percentages

49.0% of the participants who had job currently used any family planning methods,. The p value is 0.001.

Table. 4.7.100. Distribution of women by current use of contraceptive methods andself-evaluated economical status (Nadersha Kot District-Af, 2014)

Self-evaluated	Currently not using		Current	ly using	Т	otal		
economical	n	%	n	%	n	% *	p-value	
status								
Low	161	89.0	20	11.0	181	20.4		
Medium	288	76.8	87	23.2	375	42.4		
High	250	76.0	79	24.0	329	37.2	< 0.001	
Total	699	79.0	186	21.0	885	100.0		

\*Column percentages; others are row percentages

11.0% of the participants whose self-stated economic status were low currently used any family planning methods, but the ones whose self-stated economic status were medium and high used currently any family planning methods more than low self-stated economic status. The p value is 0.001.

	Current use of contraceptive method							
Husbands' age	Currently not using		Currently using		Total			
	n	%	n	%	n	% *	p- value	
≤24	59	89.4	7	10.6	66	7.4		
25-29	169	76.8	51	23.2	220	24.9		
30-34	214	80.5	52	19.5	266	30.1		
35-39	117	73.1	43	26.9	160	18.1	< 0.001	
40-44	45	66.2	23	33.2	68	7.7		
45-49	84	90.3	9	9.7	93	10.5		
≥50	11	91.7	1	8.3	12	1.3		
Total	699	79.0	186	21.0	885	100.0		

Table.4.7.101. Distribution of women by current use about contraceptive method and husbands' age group (Nadersha Kot District-Afghanistan, 2014)

33.2% of the participants, whose husbands' age group ranges from 40-44 years currently used any family planning methods more than other age groups. Generally, the ones whose husbands were in the middle age groups used currently any family planning methods more. (p=0.001).

	Current use of contraceptive method						
	Currently not		Current	tly			
Husbands' level of	using		using		Total		
education	n	%	n	%	n	% *	p- value
Illiterate	474	85.6	80	14.4	554	62.6	
Literate	63	94.0	4	6.0	67	7.6	
Primary school	17	68.0	8	32.0	25	2.8	
Secondary school	9	56.2	7	43.8	16	1.8	< 0.001
High secondary school	127	60.8	82	39.2	209	23.6	
University	9	64.3	5	35.7	14	1.6	
Total	699	79.0	186	21.0	885	100.0	

Table.4.7.102. Distribution of women by current use of contraceptive methods and husbands' level of education (Nadersha Kot District-Af, 2014)

39.2% of all participants whose husbands were high school graduate used any family planning methods currently more. Generally, the ones whose husbands were educated used any current family planning methods more than low or uneducated. The p-value is 0.001.

Table.4.7.103. Distribution of women by current use of contraceptive methods and husbands' working status (Nadersha Kot District-Afghanistan, 2014)

	Current use of contraceptive method									
	Currently	' not	Currently	у						
Husbands' working	using		using		Total					
status	n	%	n	%	n	% *	p-value			
Yes	136	62.1	83	37.9	219	24.7				
No	563	84.5	103	15.5	666	75.3	< 0.001			
Total	699	79.0	186	21.0	885	100.0				

\*Column percentages; others are row percentage
15.5% of the participants whose husbands did not have job used currently any family planning methods less than the ones whose husbands had job. The p value is 0.001.

Table.4.7.104. Distribution of women by current use of contraceptive methods and number of pregnancies (Nadersha Kot District-Afghanistan, 2014

	Current use of contraceptive method											
	Currently not		Curre	ently								
	using		using		Total							
Number of pregnancies	n	%	n	%	n	% *	p- value					
1-2	127	76.0	40	24.0	167	18.9						
3-4	228	76.5	70	23.5	298	33.6						
5-6	199	78.7	54	21.3	253	28.6	0.02					
7-8	92	82.9	19	17.1	111	12.9						
≥9	53	94.6	3	5.4	56	6.3						
Total	699	79.0	186	21.0	885	100.0						

\*Column percentages; others are row percentages

24.0% of the participants from 1-2 numbers of pregnancy group currently used any family planning methods. Generally the ones whose numbers of pregnancy were less currently used any family planning methods more than the ones whose numbers of pregnancy were more. The p value is 0.02.

Table. 4.7.105. Distribution of women by current use of contraceptive methods andplace of last delivery (Nadersha Kot District- Afghanistan, 2014).

		Current use of contraceptive method										
	Curren	tly not used	Curren	tly used								
Place of the last	any	method	any n	nethod	Т							
delivery	n	%	n	n %		% *	p-value					
At home	420	89.2	51	10.8	471	54.3						
At hospital	261 65.9		135	34.1	396	45.7	< 0.001					
Total	681	78.5	186	21.15	867	100.0						

\*Column percentages; other are row percentages

34.1% of the participants were given last delivery at hospital. The p value is 0.001.

Table.4.7.106. Distribution of women by current use of contraceptive methods and place of last delivery (Nadersha Kot District- Afghanistan, 2014).

	_	Current use of contraceptive method									
	Current	ly not used	Curren	ntly used							
Attendant of last	any method		any m	any method							
delivery	n	%	n	%	n	% *	p-value				
Others	420	89.2	51	10.8	471	54.3					
Health personal	261	65.9	135	34.1	396	45.7	< 0.001				
Total	681	78.5	186	21.5	867	100.0					

\*Column percentages; other are row percentage

More than one third (34.1%) of the participants last birth was attended by health personal. (p=0.001). Statistically p value is significant.

Table. 4.7.107. Distribution of women by the persons who decided to the currentlyused method (Nadersha Kot District-Afghanistan, 2014)

Person who	Oral pill		Injection		IUD		Male Condom	
decided	n	%	n	%	n	%	n	%
Herself	35	59.3	15	26.3	4	11.1	2	6.2
Husband	2	3.4	8	14.1	1	2.7	9	28.1
Together	22	37.3	34	59.6	31	86.2	21	65.7
Total	59	100.0	57	100.0	36	100.0	32	100.0

59.3% of the participants' own decisions for using pills was common decision for using pills was 3.4%, their husbands decision for using oral pills was 37.3%, her own decision for using injectables was 26.3%, decision made together for using injectables was 59.6% their husbands decision for using injectables was 14.1%, herself decision for using IUD was 11.1%, their husbands decision for using IUD was 2.7%, decision made together for using IUD was 86.2%, her own decision for using male condom was 2.6%, their husbands' decision for using male condom

was 28.1%, decision made together for using male condom was 66.7% and tubal ligation were decided together.

	Person who decided to use the current method									
-	Herself		Husbands		Both		Total			
Age groups	n	%	n	%	n	%	n	% *	p- value	
≤29	22	27.2	10	12.3	49	60.5	81	43.5		
30-39	31	34.4	8	8.9	51	56.7	90	48.4	0.671**	
40-49	3	20.0	2	13.3	10	66.7	15	8.1		
Total	56	30.1	20	10.8	110	59.1	186	100.0		

Table.4.7.108. Distribution of women by the person who decided to use the current method and age (Nadersha Kot District-Afghanistan, 2014)

\* Column percentages; others are row percentages

\*\* For Chi - square analysis; age groups revised as  $\leq$ 29 and 30 $\geq$ 

66.6% of the participants who were at the age group of 40-49 years made decision to use this current method together. The decision made together to use this current method was more than the decisions made by only the women and only by husbands. The p value is 0.671. Statistically p value isn't significant.

### 4.8. Making decision of the currently using contraceptive method

Table.4.8.109. Distribution of women by the person who decided to use the current method and level of education (Nadersha Kot District-Af, 2014)

		Person who decided to use the current method										
Level of	Herself		Hus	Husbands		Both		l				
education	n	%	n	%	n	%	n	<b>%</b> *	p- value			
Illiterate	37	33.6	14	12.7	59	53.6	110	59.1				
Literate	3	23.1	3	23.1	7	53.8	13	7.0	0.177**			
Primary/seconda	4	25.0	-	-	12	75.0	16	8.6				
ry school												
High school	12	25.5	3	6.4	32	68.1	47	25.3				
Total	56	30.1	20	10.8	110	59.1	186	100.0				

\*\*For Chi – square analysis educational status groups revised as illiterate and literate

\*Column percentages; other are row percentages

75.0% of the participants who were primary and secondary school graduates decided to use this current method together with their husbands. Decisions made together to use this current method were more the decisions made by only the women and only by husbands. (p=0.177).

Table.4.8.110. Distribution of women by the person who decided to use the current method and age at first marriage (Nadersha Kot District- Af, 2014)

	Person who decided to use the current method										
Age at first	Herself		Hus	Husbands Both			Tota	l			
marriage	n	%	n	%	n	%	n	% *	p- value		
16	10	22.2	3	6.7	32	71.1	45	24.2			
17	9	31.0	3	10.3	17	58.6	29	15.6	< 0.011		
18	25	49.0	7	13.7	19	37.3	51	27.4			
≥19	12	19.7	7	11.4	42	68.9	61	32.8			
Total	56	30.1	20	10.8	110	59.1	186	100.0			

\*Column percentages; others are row percentages

68.9% of the participants at the age group of  $\geq$ 19 years at the first marriage, decided to use this current method together with their husbands. When age at first marriage increased the number of decisions to use this current method also increased in together decision. The p value is 0.001.

Table.4.8.111. Distribution of women by the person who decided to use the current method and working status (Nadersha Kot District-Af, 2014)

	Person who decided to use the current method											
Working	Herself		Husbands		Both		Total					
status	n	%	n	%	n	%	n	<b>%</b> *	p- value			
Yes	11	23.4	3	6.4	33	70.2	47	25.3				
No	45	32.4	17	12.2	77	55.4	139	74.7	0.186			
Total	56	30.1	20	10.8	110	59.1	186	100.0				

\*Column percentages; others are row percentages

70.2 % of the participants who had a job decided to use this current method together with their husbands. The number of decisions made together to use this current method was more when the women had a job. The p value is 0.186.

Table.4.8.112. Distribution of women by the person who decided to use the current method and self-evaluated economical status (Nadersha Kot District-AfghanistanJan-2014)

		Person who decided to use the current method											
Self-evaluated	Her	self	Husbands		Both		Tota	l					
economical	n	%	n	%	n	%	n	% *	p- value				
status													
Low	4	20.0	1	5.0	15	75.0	20	10.7					
Medium	27	31.1	11	12.6	49	56.3	87	46.8	0.613				
High	25	31.6	8	10.2	46	58.2	79	42.5					
Total	56	30.1	20	10.8	110	59.1	186	100.0					

\*Column percentages; others are row percentage

75.0% of the participant whose self-stated economic status were low made decision to use this current method. Decisions made together to use this current method were more in all self-stated economic status than the decisions made only by woman and only by husband. The p value is 0.613.

Table.4.8.113. Distribution of women by the person who decided to use the current method and husbands' age group (Nadersha Kot District- Af, 2014)

		Person who decided to use the current method											
Husband's	Herself		Hust	oands	Both		Total						
age group	n	%	n	%	n	%	n	% *	p- value				
≤29	17	29.3	7	12.1	34	58.6	58	31.2					
30-34	13	25.0	7	13.5	32	61.5	52	28.0					
35-39	15	34.9	4	9.3	24	55.8	43	23.1	0.895				
≥40	11	33.3	2	6.1	20	60.6	33	17.7					
Total	56	30.1	20	10.8	110	59.1	186	100.0					

\*Column percentages; others are row percentages

60.6% of the participants whose husbands were at the age group of  $\geq$ 40 decided to use this current method together with their husbands. Decisions made together to use this current method were more in all their husbands' age groups than the decisions made only by women and only by husband. The p value is 0.895.

Table.4.8.114. Distribution of women by the person who decided to use the current method and husbands' level of education (Nadersha Kot District-Afghanistan, 2014)

		Person who decided to use the current method											
Husbands' level	Her	self	Hus	band	Both		Total						
of education	n	%	n	%	n	%	n	% *	p- value				
Illiterate	26	32.5	5	6.2	49	61.3	80	43.0					
Literate/primary/ secondary school	9	47.4	1	5.2	9	47.4	19	10.2	0.095				
High school /university	21	24.1	14	16.1	52	59.8	87	46.8					
Total	56	30.1	20	10.8	110	59.1	186	100.0					

\*Column percentages; others are row percentages

61.3% of the participants who were illiterate decided to use current method together with their husbands. Decisions made together were more when their husbands were educated than the decisions made only by women and only by husbands. (p=0.095).

Table.4.8.115. Distribution of women by the person who decided to use the current method and husbands' working status (Nadersha Kot District-Afghanistan, 2014)

		Person who decided to use the current method											
Husbands'	Herself		Husbands		Both		Total						
working status	n	%	n	%	n	%	n	% *	p- value				
Yes	20	24.1	13	15.7	50	60.2	83	44.6					
No	36	34.0	7	6.8	60	58.3	103	55.4	0.075				
Total	56	30.1	20	10.8	110	59.1	186	100.0					

\*Column percentages; others are row percentages

60.2% of the participants whose husbands had a job decided to use this current method together with their husbands. Either their husbands had job or not had

job decisions made together were more than the decision made only by women and only by husbands. The p value is 0.075.

Table.4.8.116. Distribution of women by the person who decided to use the current method and number of pregnancies (Nadersha Kot District-Afghanistan, 2014)

	Person who decided to use the current method								
Number of	Her	self	Hus	band	Both		Tota	1	
pregnancies	n	%	n	%	n	%	n	% *	p- value
1-2	13	28.9	6	13.3	26	57.8	45	24.2	
<u>≥</u> 3	43	30.5	14	9.9	84	58.6	141	75.8	0.812
Total	56	30.1	20	10.8	110	59.1	186	100.0	

\*Column percentages; others are row percentages

58.6% of the participants who were at the pregnancy group of  $\geq 3$  numbers, decided to use this current method together with their husbands. The p value is 0.812.

# **5.9.** Logistic regression analysis of the association some socio-demographic characteristics and women knowledge, ever and current use of family planning methods and place of last delivery

The analysis was performed by using binary logistic regression where backward conditional method was specified in order to identify confounders and/ or effect modifiers. Odds Ratio (OR) with corresponding 95% Confidence Interval (CI) was used to estimate the strength of association between the retained independent predictors of "knowledge about family planning methods, ever- use, current use of contraceptive methods and place of last delivery", and the threshold for statistical significance was set at p<0.05. Table. 4.117, 4.118, 4.119 and Table 4.120 shows the results of multivariate logistic regression analysis.

Factors which were predictors of knowledge about family planning methods, ever-use, current use of family planning methods and place of last delivery of married women among aged 15-49 years in Nadersha Kot District were identified as; age, women level of education, age at first marriage, type of family, working status of women, self-evaluated economic status, age of husbands, educational status of husband, working status of husbands and number of pregnancies.

Table.4.9.117. Logistic Regression analysis of the association some sociodemographic characteristics and women knowledge any family planning method (Nadersha Kot District-Afghanistan, 2014)

Factor	OR(95% CI)	p- value
Women's working status		
No	Reference	
Yes	3.7 (1.4-10.4)	0.010
Husbands' age		
≤24	4.6 (2.1-10.1)	< 0.001
25-29	5.5 (2.9-10.3)	< 0.001
30-34	3.1 (1.6-6.0)	< 0.001
35-39	4.8 (2.5-9.1)	< 0.001
40-44	4.6 (3.0-9.8)	< 0.001
≥45	Reference	
Educational status of women		
Illiterate	Reference	
Literate	3.6 (2.1-6.4)	< 0.001
Husbands' level of education		
Illiterate	Reference	
Literate	0.9 (0.5-1.6)	0.7
Primary/secondary school	3.1 (1.4-6.8)	0.005
High school/university	2.8 (1.9-4.2)	< 0.001
Self-evaluated economical status		
Low	Reference	
Medium	1.5 (1.1-2.4)	0.029
High	1.3 (0.9-2.0)	0.16

At the result of multivariate logistic regression analysis, factors which were predictors of ever use of contraceptive methods in Nadersha Kot District were identified as; women working status(yes; OR=3.7 CI=1.4-10.4),age of the husband (25-29; OR=5.5 CI=2.9-10.3, 30-34; OR=3.1 CI=1.6-6.0, 35-39; OR=4.8 CI=2.5-9.1, 40-44; OR=4.6 CI=3.0-9.8), women educational status (literate; OR=3.6

CI=2.1-6.4), husband's education (primary/ secondary scho	ool graduated;	(OR = 3.1)
CI=1.4-6.8, high school/ university graduated; OR=2.8	CI=1.9-2.4)	and self-
evaluated economic status( medium OR=1.5 CI=1.1-2.4, hig	gh OR=1.3, CI=	=0.7-2.3 ).

Table.4.9.118.Logistic Regression analysis of the association some socio-<br/>demographic characteristics and women ever use of any family<br/>planning method (Nadersha Kot District-Afghanistan, 2014)

Factor	OR(95% CI)	p-value
Husbands' level of education		
Illiterate	Reference	
Literate	0.6 (0.3-1.5)	0.32
Primary/secondary school	2.4 (1.1-5.1)	0.024
High school/university	2.7 (1.8-4.1)	< 0.001
Number of pregnancy		
1-2	8.9 (1.1-70.7)	0.038
3-4	5.1 (0.6-41.4)	0.124
≥5	Reference	
Self-evaluated economic status		
Low	Reference	
Medium	1.9 (1.1-3.3)	0.016
High	1.3 (0.7-2.3)	0.31
Husbands' age		
≤24	Reference	
25-29	2.7 (1.1-6.6)	0.028
30-34	2.7 (1.1-6.56)	0.031
35-39	5.1 (1.9-13.7)	< 0.001
40-44	10.1 (3.4-30.2)	< 0.001
≥45	2.4 (/0.7-7.7)	0.13
Educational status of women		
Illiterate	Reference	
Literate	2.7 (1.3-5.5)	0.007
Primary/secondary school	3.5 (1.6-7.8)	< 0.001
High secondary school	5.1 (3.1-8.8)	< 0.001

At the result of multivariate logistic regression analysis, factors which were predictors of ever use of contraceptive methods in Nadersha Kot District were identified as; husband's education (primary/ secondary school graduated; (OR=2.4 CI=1.1-5.1, high school/ university graduated; OR=2.7 CI=1.8-4.1), less number of pregnancy (1-2 pregnancy; OR=8.9 CI=1.1-70.7), medium economic status (OR=1.9 CI=1.1-3.3), age of the husband (25-29; OR=2.7 CI=1.1-6.6, 30-34; OR=2.7 CI=1.1-6.6, 35-39; OR= 5.1 CI=1.9-13.7, 40-44; OR= 10.1 CI=3.4-30.2) and women educational status (literate; OR=2.7 CI=1.3-5.50, primary/ secondary school graduated; OR=3.5 CI=1.6-7.8, high school; OR=5.1 CI=3.1-8.8).

Table.4.9.119. Logistic regression analysis of association of some socio demographic characteristics of women by the current use of any family planning method (Nadersha Kot District-Afghanistan, 2014)

Factor	OR(95% CI)	p-value
Husbands' level of education		
Illiterate	Reference	
Literate	0.3 (0.1-1.1)	0.077
Primary/secondary school	2.4 (1.1-5.2)	0.020
High school/university	2.5 (1.7-3.8)	< 0.001
Number of pregnancies		
1-2	7.7 (1.0-60.3)	0.05
3-4	4.1 (0.5-33.1)	0.2
≤5	Reference	
Self-evaluated economical status		
Low	Reference	
Medium	1.9 (1.1-3.4)	0.020
High	1.3 (0.7-2.4)	0.3
Educational status of women		
Illiterate	Reference	
Literate	2.6 (1.2-5.5)	0.010
Primary/secondary school	3.4 (1.6-7.3)	< 0.001
High secondary school	3.8 (2.2-6.5)	< 0.001
Husbands' age		
≤24	0.3 (0.1-1.2)	0.09
25-29	0.9 (0.4-2.3)	0.91
30-34	0.9 (0.4-2.1)	0.87
35-39	1.8 (0.8-4.1)	0.012
40-44	3.7 (1.5-8.8)	0.003
≥45	Reference	

At the result of multivariate logistic regression analysis, factors which were predictors of current use of contraceptive methods in Nadersha Kot District were identified as; husband's education (primary/ secondary school graduated; OR=2.4 CI=1.1-5.2, high school/ university graduated; OR=2.5 CI= 1.7-3.8), less number of

pregnancy (1-2) pregnancy; OR=7.7 CI=1.0-60.3), self-evaluated economic status (medium economic status OR=1.9 CI=1.1-3.4), women education (literate; OR=2.6 CI=1.2-5.5, primary/ secondary school graduated; OR=3.4 CI=1.6-7.3, high school graduated; OR=3.8 CI=2.2-6.5) and age of the husband (25-29; OR=0.9 CI=0.4-2.3, 30-34; OR=0.9 CI=0.4-2.1, 35-39; OR= 1.8 CI=0.8-4.1, 40-44; OR=3.7 CI=1.5-8.8).

Table.4.9.120. Logistic regression analysis of the association of some

Socio demographic characteristics of women and place of the last delivery (Nadersha Kot District-Afghanistan, 2014)

Factor	OR(95% CI)	p-valve
Numbers of pregnancies		
1-2	3.9 (0.4-33.7)	0.20
3-4	2.4 (0.3-20.0)	0.4
≥5	Reference	
Women's age group		
≤24	2.7 (1.1-7.5)	0.04
25-29	2.7 (1.1-7.1)	0.03
30-34	2.5 (1.1-6.1)	0.04
35-39	4.5 (1.8-11.2)	<0 .001
40-44	1.2 (0.4-3.2)	0.72
45-49	Reference	
Husbands level of education		
Illiterate	Reference	
Literate	0.7 (0.4-1.3)	0.29
Primary/secondary school	2.3 (1.0-4.0)	0.051
graduate		
High school/university	2.7 (1.6-3.4)	< 0.001
graduate		
Women's working status		
No	Reference	
Yes	2.8 (1.6-4.8)	< 0.001

At the result of multivariate logistic regression analysis, factors which were predictors of place of last delivery of contraceptive methods in Nadersha Kot District were identified as;, less number of pregnancy (1-2) pregnancy; OR=3.9 CI=0.4-33.7), age of the women (25-29; OR=2.7 CI=1.1-7.1, 30-34; OR=2.5 CI=1.1-6.1, 35-39; OR= 4.5 CI=1.1-11.2, 40-44; OR= 1.2 CI=0.4-3.2),husband's education (primary/ secondary school graduated; OR=2.3 CI=1.0-4.0), high school/ university graduated; OR=2.7 CI=1.6-3.4) and women working status( yes; OR=2.8 CI= 1.6-4.9).

### 5. DISCUSSION

This study assessed the prevalence of family planning method use and associated factors among married women aged between 15-49 years in Nadersha Kot District-Afghanistan. A total of 885 participants were interviewed based on the objective of the study. It was found out that in Nadersha Kot District, prevalence of ever use of family was 23.2% and current use was 21.1%. figures of ever and current use of family planning methods were similar and lower than the neighbor countries family planning as well as other countries in the region( Eastern Mediterranean region).

#### 5.1. Some socio-demographic characteristics of women

The mean age of the participants in the study group was  $31.1\pm6.6$  years. Almost 71.8% of the participants were younger than 35 years old. The most striking feature of the Afghan population is its very young age structure. In the rural areas, 71.1% of the participants are less than 35 years old, where elderly of 65 or over are around 4% (26).

In Afghanistan, it is too difficult to learn the correct age of the women because they don't know their correct birth date. Very small number of the women have national identity card, and they usually tend to state their ages lower than their actual age. Only 5.5% of the oldest participants belonged to age group (45-49) years (67).

According to the findings of this study, the female literacy rate was 19.1% and male was 37.4% and overall literacy rate of findings this study was 28.2% at the time of survey. In Afghanistan, women literacy rate is 22.2%, males is 45.4%, and overall is 33.8%. In the urban population, the literacy rate is more than twice as high as that in the rural population (67).

The mean number of household members was  $15.1\pm4.1$  less than one third of the households (30.8%), where lived fifteen or more people. Findings of study conducted by the Ministry of Rural Rehabilitation and Development (MRRD) revealed out that average number of the household members was eight people (68).

(AMCS) Showed overall, mean of household size is 7.8% per household with a small difference between urban and rural area (69).

The mean age of women at the time of first marriage was  $17.6\pm2.1$  years. More than two fifth of the women (44.6%) were married before the age of 18. AMICS showed that overall, 46% of women aged between 15-49 years were married before the age of 18 and rural girls and women are more likely to marry earlier than urban girls (67).

According to the World Bank data, women's mean age, at the time of first marriage in Afghanistan, is 21.5 years (World Bank 2014) which is an older age than the finding of this study. Traditionally in Afghanistan, each female should get married after the menarche. Parents encourage their daughters to marry while they are still children. They hope that the marriage will benefit them both financially (such as through the payment of a bride price) and socially which will also relieve the financial burdens of the family (67).

In the finding of this study, 4.2% were only nuclear family and 95.8% were extended family. A study conducted in India stated that 51.4% were nuclear family and 48.6% were extended family. The difference may be due to the sociocultural and educational status (70).

At the time of study, just 10.8% of the women were working. Generally in Afghanistan, due to cultural barriers and security problem, majority of the educated women works as governmental employees in educational or health sectors. In the year of 2009 in Afghanistan, 20% of the governmental employees were females (women and men in Afg.2012). It means that one fifth of the governmental staff was female, and this was higher than the figure of 17 % in 2007 (71).

20.2% of the participants in this study evaluated their economic status as low, 42.3% as medium and 37.2% as high. Study that was conducted by Afghanistan National Development Strategy (ANDS) reported 45% as medium economic status of Khost province. There is no difference between the medium economic status of finding of this study and ANDS study (72). 5.2. Number of parity, missed abortion, stillbirth and induced abortion In the study, the average number of parity was 4.2 and 4.3% of women had 9 or more pregnancy. Also the mean number of living children was  $4.2\pm2.0$ , and two fifth of the women (41.3%) had five or more than five alive children. The total fertility rate in Afghanistan is 5.1(MoPH HI fact sheet 2012) and proportion of children under 15 years old is among the highest in the world and significantly higher than that of the neighboring countries(68).

The high percentage of children in the population is a direct result of high fertility.

In this study, it was found out that the spontaneous abortion rate was 16.5% and the mean number of spontaneous abortion was  $1.3\pm0.6$ .

The prevalence of spontaneous abortion can range from 5% to 70% of pregnancies, depending on stage of development. Worldwide, 22% of pregnancies, or about 42 million, are electively terminated and 20 million of them happen under unsafe conditions mostly in the developing world. Contraception plays a key role in reducing reliance on elective abortions and can avert as many as 13%–15% of the maternal deaths that result from unsafe abortions (73).

In Spain and Madrid, the spontaneous abortion rate among clinical pregnancy is about 12-15%, but including early pregnancy losses, it is 17-22% too. There is no significance difference between above spontaneous abortion rates. To compare the spontaneous abortion rate of this study to Spain and Madrid, similarly there is no much difference (74).

Estimated stillbirth rate per 1000 birth in the World is 24, in the Southeast Asia region is 18 and in the Latin America/Caribbean is 10. In the finding of this study 8.1% of women had stillbirth and the mean number of women stillbirth was  $1.1\pm0.4$  (75).

In Turkey, the induce abortion is 9.0% of these women who had at least one pregnancy in their life had at least one induced abortion. The lifetime induced abortion per 100 pregnancies was found to be 2.45. The primary reason given for

induced abortions was "want no more children". According to findings of this study, the induce abortion was only 0.8%. In the finding of this study, the percentage of women induce abortion is too less than women induce abortion of Turkey. In Afghanistan, people culturally do not want to terminate unwanted pregnancy and they want more children, because the total fertility rate is too high, otherwise in Afghanistan it is not legal to terminate induce abortion (76).

### **5.3.** Characteristics related to last pregnancy

At the time of study, the mean numbers of the last pregnancy interval was  $18.5\pm15.8$  months. The median birth interval in Afghanistan is 27 months. The median number of months, since a preceding birth increases with age, from a low of 23 months among mothers age 15-19 to a high of 31 months among mothers age 40-49. There is no marked difference in the length of the median birth interval by birth order or sex of the last birth (72).

The study showed that more than half (54.2%) were given birth at home and the rest in the hospital.

According to background characteristics, nearly one third (33%) were given birth in a health facility and more than two third (67%) were given birth at home (AMS). There is a little difference between the study finding and study that held by Afghan government about place of the last delivery because the Governmental study was held in 2010.

In Turkey, 91.3% women were given birth in the hospital and also the mentioned given birth were assisted by health personals (77).

This is much higher than the deliveries assisted by health personal in Afghanistan. Above mentioned deliveries were assisted by health personal in Nadersha Kot District-Afghanistan, and this may be due to poor educational status of the couple, poor economic, socio-cultural and security problems.

The more frequent reason stated for not delivering in a health facility was the high costing charged in health other followed by the sudden happening of the delivery (23.2%) and accessibility problems (21.1%).opposite to a study done by the government which found the unnecessity of giving birth in a health facility, 35% being not customary(77).

### 5.4. Knowledge, ever and current use of contraceptive methods

Of the participants 52.3% stated that they knew at least one contraceptive method while only 23.3% was ever-used a method. This prevalence was decreased to 21.0% when the current use evaluated. The most common currently used method was oral pill (6.7%) of all women 31.7% among women who knew oral pill. Followed by injectables (6.4%). Because of socio-cultural values and feeling of shame, the participants did not mention any traditional contraceptive method even it was probed while interviewing. At the time of survey, the researcher explained and repeated the traditional contraceptive methods questions, but unfortunately the participants did not have knowledge about traditional methods.

According to the World Health statistic any used contraceptive methods prevalence was 23.0% in 2012. This prevalence decreased to 22.0% when the above mentioned organization reported in 2013 (78-25).

Afghanistan Multiple Indicators Cluster survey (AMCS) showed the specific family planning methods they were using at the time of the interview. More than one-fifth of currently married women use some method of family planning (22%), with the vast majority (20%) using a modern method. The first common method currently used is injectables (7%), followed by the pill (5%) and Lactational amenorrhea method (LAM) (4%). Among traditional methods, the most commonly used method is withdrawal, which is used by 1% of currently married women (69).

In the finding of this study, the most common currently used method was oral pill because the participants answered at the time of interview that pill usage is easy, but the (AMCS) showed that the most currently used method is injectables.

According to Afghans' migration, they are still living in Pakistan, and more than two fifth (44.9%) knew at least one of the family planning methods. The most common

method was more than two fifth (40.7%) used pill and second method used was male condom (79).

In the United States, 76% of women who practice contraception currently use nonpermanent methods, primarily hormonal methods (the pill, patch, implant, injectable and vaginal ring), the IUD and condoms. The tubal ligation on female is (29%) or vasectomy on male is (10%). The pill and female sterilization have been the two most commonly used methods since 1982 (80).

The 2012 Tajikistan Demographic health survey (TjDHS) found that over one-quarter (28%) of currently married women are using some methods of contraception. Most currently married women rely on a modern method 26%, with only 2% relying on a traditional method. By far, the most popular method is the IUD, used by 19% of married women. More than six in ten women practicing family planning use the IUD. The pill, the male condom, injectables, and withdrawal are each used by 2% of married women. Less than 1% of women report using female sterilization (81).

In Pakistan, contraceptive prevalence is 27.2% and only 22% of the families use modern contraceptives. Among modern contraceptives, besides female sterilization, the most commonly used modern method is male condom (82).

In Pakistan, 56.2% of the participants knew about some contraceptive methods, and the main source of their information were relative and friends (63.3%) in the informed group, followed by health personnel 25.7%, while for the remaining informed literate participants, source was either media or literature (83).

The contraceptive prevalence rate in the United State is 76%, Contraceptive prevalence was only 21.0% in this study, but very low in comparison to CPR of neighboring countries as 48% in India, 58% in Bangladesh, 70% in Sri Lanka, 27.2% in Pakistan, 28% in Tajikistan and in the United State it is 76%. The very low CPR may be due to last three decades conflict, less literacy rate, high parity, low economic status, less health facilities and lack of skilled health personal and also accessibilities and availabilities problem of health services in Afghanis (84).

In the finding of this study more than one third (35.2%) of women future intention is to use any contraceptive methods. The most common methods, more than half (53.0%) of women future intention to use was oral pill and less than one fourth (24.1%) was injection, after that it followed IUD and that was 19.3%. In Pakistan, 11.9% women future intention to use tubal ligation and less than one third (29.4%) of women future intention to use any contraceptive methods (85).

In the finding of this study 58.0% of age group 20-24 years, 52.8% of age group 25-29 years, 50.8% of age group 35-39 years knew at least one contraceptive method. This difference was statistically significant p (<0.001). In another study from Afghanistan showed 35-39 years knew 29%, 40-44 years 21% knew some contraceptive method. There is a little difference between the findings of this study and (AMS). This may be due to the year intervals AMS held in 2010 (77).

Knowledge on family planning method and relation to some characteristics of the women's education, attending maternal health care services and reference according to the finding of this study, women did not have enough knowledge about contraceptive method, and 39.0% of illiterate women had knowledge about contraceptive method. The secondary school graduates had 100% knowledge and primary school 80.0%, literate 57.0% and high school graduate had 93.5% knowledge about contraceptive method. This difference was statistically significant (p<0.001). Study that was conducted in Nepal showed the impact of women's education levels on contraceptive behavior, and contraceptive method choice has been extensively studied. Higher education levels of women have been shown consistently to have a positive effect on the use of contraception (86).

In Pakistan, 56.2% of the participants knew about some contraceptive methods, and the main source of their information were relatives and friends (63.3%) in the informed group, followed by health personnel 25.7%, while for the remaining informed literate participants, the source was either media or literature (87).

Study conducted in India showed that 98% of educated participants heard about oral pills, 88% of the participants heard about IUD and 54% uneducated participants did

not hear about any contraceptive methods. Generally, educational status of women and their husbands' had positive effects about knowledge on contraception (88).

According to the finding of this study, 93.8% of women were working at the time of survey and they knew at least one contraceptive method. The difference was statistically significant (P<0.001). A study in Pakistan showed 83.2% of women working status (88).

This study showed that age group 25-29 years, 23.8%, ever used contraceptive method, age group 30-33 years 27.1%, age group 35-39 years 33.1% ever used contraceptive method. The difference is statistically significant (p<0.001). In another study from Pakistan stated that 26-30 years age group was 25.6% and 31-35 years age group was 21.0%. There is not too much difference between age group of ever used contraceptive methods (88).

According to the finding of this study, 20.0% literate participants-ever used contraceptive method. The difference was statistically significant (p<=0.001). In another study from India 61.0% were literate women who ever used contraceptive method (90).

According to the finding of this study, number of pregnancy group 1-2 used 26.9%, 3-4 used 26.2%, 5-6 used 23.3%, 7-8 used 18.9% and  $\geq$ 9 used 5.4% at least one contraceptive method. The difference was statistically significant (p<0.001). In another study from low income urban India, number of pregnancy group 1-2 used 36.8%, number of pregnancies 3 used 41.8% and  $\geq$  4group of pregnancies used 19.9% at least one contraceptive method (91).

Most women who had used family planning methods were influenced by their husbands. Finding of this study revealed out that 30.1% made decision themselves by using any modern contraceptive methods, 80.8% made decision with their husbands and 59.1% made decision together by using any contraceptive methods. A study that was conducted in Ghana figured out that the majority of women, 81%, thought that male partners should be involved in the decision to use modern family planning

methods. This estimation includes women who thought both partners 78.1% should make decision (91).

Finding of this study figured out that more than one fifth (22.0%) of women ever got married to first degree relatives and 78.0% of women got married to nonrelatives. A study that was conducted in Pakistan reported that more than half (56%) of all marriages are between first degree and one-third 44% are between nonrelatives (92).

Finding of this study showed that married women who were using a specific modern method of family planning were asked whether they had experienced any side effects from their current method. Among these women, 33.9% had irregular menses or abnormal vaginal bleeding. Another study that was conducted in Pakistan showed that 37% women who are using the modern contraceptive methods were exposed to the side effects like irregular menses or excessive vaginal bleeding. The above mentioned percentage is similarly (92).

## 5.8. Knowledge, ever use and current use of contraceptive methods and place of last delivery

Finding of this study reported that the ones who had knowledge at least one form of contraceptive methods are more than two third (67.2%) of the participants who were given last delivery at hospital and also in the same percentages of last birth of women were attendant by health personal. The difference was statistically significant p<0.001. A study that was conducted in rural Laotians, Jimma Zone and Ethiopia reported that majority (87.1%) of women, whose knowledge and awareness was better about at least one contraceptive method, were given delivery at hospital. The difference might be due to giving birth at health facilities including lack of access to health facilities due to long distances between rural villages and health facilities, poor roads and high transport costs. The costs of getting in a health facilities, attitudes, quality of care, and care practices at the health facilities including a lack of privacy and the presence of male staff, socio-cultural and low educational level of women and their husbands have been identified as problems in Nadersha Kot District and difficulties. (93-94).

Finding of this study figured out that more than one third (34.1%) of the participants who are currently using at least one modern contraceptive methods were delivered at to hospital. In the same percentages, last birth of women was attendant? by health personal and the difference is statistically significant p<0.001. Another study from Bangladesh stated that more than two third (68.7%) of women who were using any contraceptive methods were delivered to hospital. The difference between this study and the other study that held in Bangladesh may be due to low socio-economic status, last three decade fight, accessibility problem, knowledge and awareness about family planning and low educational level of both sexes (95).

### 5.9. Findings of multivariate Logistic regression analysis

Factors which were predictors of knowledge about family planning methods of married women among aged 15-49 years in Nadersha Kot District identified as; women level of education, working status of women, self-evaluated economical status, age of husbands, educational level of husbands and family planning services of women in the area (Table. 4.117). This finding is consistent with the study done in Kassala, Eastern Sudan that; age, women level of education, husband's educational status and number of pregnancy (96).

Factors which were predictors of using of family planning methods of women aged between 15-49 years in Nadersha Kot District identified as husband's level of education, number of pregnancies, self-evaluated economical status, husband's age group and educational status of women (Table. 4. 119). Study conducted in Pakistan reported that age, age at first marriage, level of education (illiterate and literate) family type, husbands' working status, ever heard about family planning and using any contraceptive methods and other study showed women working status (64-97).

### 6. CONCLUSIONS

The purpose this study was to determine the prevalence of family planning method among married women aged between15-49 years in the rural area of Nadersha Kot District. A total of 885 participants were included in this study.

Of the 867 participants, more than two fifth (44.8%) were given last birth in the health facilities and more than one half (53.2%) were given birth at home and the reason of giving last birth at home is as follows: 35,6% of the participants were due to health center's expensive costs, 23.2% last delivery happened suddenly, 21.1% had accessibility problem and 19.1% answered that they did not know giving birth at home. More than one third (35.2%) of the participants intended to use any modern contraceptives method in the future, 59.7% did not intend to use and 5.1% had no idea. Future preferred modern contraceptive methods of the participants are as follow: more than half (53.0%) was oral pills and followed by injectables 24.1%, IUD 19.3% and male condom is 3.6%. Generally participants learnt at least one modern contraceptive method 21.5% from health worker, 18.41% from friends and 7.3% from mass media. With the gradual increasing age at first marriage of the participants steadily increased their knowledge, ever and current use of family planning methods and giving last birth at a health facility. Type of family does not have important difference about knowledge, ever and current use of contraceptive methods, nuclear family knowledge. ever and current use of contraceptive methods were less than extended family. This difference may be due to low number of nuclear family, separated in the old age from extended family and new marriage. Education level of women and husbands, women and husbands' age, age at first marriage, type of family, working status of women and husbands in the decision of current used method did not have significant difference because common decision of current used method of modern contraceptives was more than them and their husbands.

Every four women out of five were illiterate. Educated women, their husband's knowledge and usage of contraceptive were better among the participants. It was achieved that the educated participants and their husbands knew and used contraceptive methods more than the uneducated. Working status of women and their husbands' was effective about knowledge and usage of contraceptive methods. Women who had job gave last birth at a health facility and also their last birth were assisted by health personal more than who didn't have job. The participants and their husbands who had job used contraceptive methods more than who do not have jobs. Level of knowledge and usage of contraceptive methods were better in the middle age than younger and older ages.

Knowledge and usage about contraceptives were better among the participants with low number of pregnancies than who had more pregnancies. Selfevaluated economic status was effective among the participants and negative about knowledge and usage of contraceptives who had medium and high self-evaluated economic status used contraceptive methods more than low self-evaluated economic status participants. The mean age of women was 31.1±6.6, years while mean age of husbands 33.4±7.1 years. The literacy rate of women was 19.1% (husbands' was 37.4%). The mean number of living children was  $4.2\pm2.0$  (mini-maxi=1-11) and the mean age at the first marriage was  $17.6\pm 2.1$  years. It was found that more than two fifth (47.7%) of women had some knowledge of any contraceptive methods, but current use was only 21.0%. The most commonly used contraceptive method was oral pill among women who had ever-used any contraceptives method followed by injectables, IUD, male condom and tubal ligation. Fear of side effects, difficulty of using, opposition of husband and intention to have child were the main reasons for discontinuing of contraceptive use. Socio-demographic factors of women were significantly associated with use of modern contraceptive methods.

The present study also concludes that knowledge about contraceptive methods was slightly high, but the contraceptive prevalence is very low in the study area.

Age and educational level of woman and husband, age at first marriage, type of family, working status of woman and husband, self-evaluated economic status, and number of pregnancies were the common related factors for knowledge about family planning methods, ever use, current use of family planning methods and place of last delivery.

### 7. RECOMMENDATIONS

This was the first study to determine the prevalence of family planning methods in Khost Province Afghanistan. This study will be beneficial for the other researchers and the future. According to this study, the knowledge awareness of women about the contraceptive methods was slightly low and contraceptive usage was very low.

Family planning program is run in a non-motivational manner with un-skilled and incapable staff, who fails to create awareness among the people, especially among the people of rural areas. Therefore, it is recommended that adequate training should be provided to the grass root level workers for further improving of their knowledge of family planning methods.

Contraceptive discontinuation is one of the recognized risks for low prevalence of contraceptive methods. There is a need to improve the educational status of the females and males to enhance their understanding and uptake of modern contraceptives. Motivation of community through media and health personnel can help to achieve positive attitude of husbands for effective use of contraceptives.

The findings suggest that there is a need to assess the actual quality of service delivered in this district.

It is suggested that health professionals, teachers and opinion leaders must be involved in the task of mobilizing the people to increase the use of modern contraceptives.

It was critical to engage clinicians and communities (men, women, religious leaders, and health committees) in culturally sensitive ways. Emphasizing the use of birth spacing to protect the health of mothers and children was especially effective. Activities to empower women including a health oriented literacy program and increasing the number of female community workers supported rapid scale-up of contraceptive use.

Health directorate commits to ensure the availability of family planning services in each of the 45 Nadersha Kot District administrative villages. Health directorate will expand information and dissemination programs about family planning to the general public and will increase awareness of the various choices available. Focusing on convenience and increasing the frequency of visits to health providers, Health personal will be introduced traditional and modern contraceptive methods including, Lactational amenorrhea, abstinence, post coital douche, coitus interruptus and oral pills, injectables, male condoms, tubal ligation, vasectomy and implants, and high quality integrated family planning services in every health post and health facility. Eligible women of this district will be persuaded to increase antenatal and postnatal visits.

### 8. **REFFERENCES**

- Park .J .E. Park's Text book of preventive & social Medicine Demography and Family planning .chapter No 8,PP 325—358 28th Edition 2005-2006; Accessed 26/6/2014.
- Tsui A O, Mosley R Mc, Burke A H. Family Planning and the Burden of Unintended Pregnancies Epidemiologic Reviews. Apr 2010; 32 (1): P (152-174). DOI: 10.1093.Accessed, 4.7.2014.
- Kohan S, Simbar M, Taleghani F. Women's experience regarding the role health centers in empowering them for family planning. Iran J Nurse Midwifery Res. 2012, 150–156; Accessed 27/6/2014.
- Heil S H, Gaalema D E, Herrmann E S. Incentives to promote family planning; Preventive medicine ; 55 (Suppl): 106–112. Doi: 10.1016. Accessed 27/6/2014
- USAID Family Planning; 2011; Available from, http://www.usaid.gov/our\_work/global\_health/pop. Accessed on 28.0
   6. 2014.
- 6. Bowie C, Geubbels E. Chapter 5-the epidemiology of maternal mortality.
  2nd edn. The epidemiology of Malawi. Malawi: Department of Community Health, College of Medicine, 2013.
  http://www.medcol.mw/commhealth/publications/epi book/Maternal health v2 2.pdf; Accessed on 28.06.2014.
- Tephenson R, Hennink M. Barriers to family planning use amongst the urban poor in Pakistan. *Asia-Pacific Population Journal*. 2004; 19 (2):5-26; Accessed, 28/6/2014.
- 8. Birth control organization >Birth control international information center, History, available

from:http://www.nyu.edu/projects/sanger/secure/aboutms/organizatio
n\_bciic.h /2010, Accessed on 29.6.2014.

 WHO. Family planning benefits fact sheet NO 351May, 2013 available from internet address, http://www.who.int/mediacentre/factsheets/fs351/en/. Accessed on 28/6 /2014.

- Singh S, Darroch JE. Adding It Up: Costs and Benefits of Contraceptive Services, Estimates for 2012. *Guttmacher Institute*. 2012. Accessed 26.6 .2014.
- Family Planning Summit Metrics Group. Technical Note: Data Sources and Methodology for Calculating the 2012 Baseline, 2020 Objectives, Impacts and Costings. Family Planning Summit, 2012. Accessed on 28.6. 2014.
- 12. Weinberger M B, Fry K, Boler T, Hopkins K, Estimating the contribution of a service delivery organization to the national modern contraceptive prevalence rate: Marie Stopes International's Impact 2 model; *BMC Public Health* 2013, 13(Suppl 2):S5 .Accessed 28.6.2014.
- Fotso C J, Cleand J, Elungata P, Birth spacing and children mortality: An analysis of prospective data from the Nairobi urban Health and demographic surveillance system; *J Biosocial Science* .2013; 45(6); 779–798; Accessed 02.08.2014.
- 14. Ikamari L, Izughara C, Ochako R. *BMC Pregnancy Childbirth*. 2013; 13:
  69. Accessed 29.06.2014.
- 15. Rakhi J, Sumathi M, Contraceptive Methods: Needs, Options and Utilization. *The Journal of Obstetrics and Gynecology of India* (November–December 2011) 61(6):626–634, DOI 10.1007/s13224-011-0107-7. Accessed, 09.07.2014.
- United Nations. Department of social affairs. Population division. World contraceptive pattern, 2013. Available;

from,http://www.un.org/en/development/desa/population/publications/ pdf/family/. World Contraceptive Patterns Wall Chart 2013.pdf. Accessed, 07.07.2014.

 Tsui A Mosley R M, Burke A E, Family Planning and the Burden of Unintended Pregnancies Epidemiologic Review, Oxford university press, 2010, 32(1),152—174; Accessed; 23/1/2014.

- Population Reference Bureau. Family Planning Worldwide 2008 Data Sheet. Washington, DC: *Population Reference Bureau*; 2008; Accessed; 15/1/2014.
- Robinson WC, Ross JA. The Costs and Benefits of Investing in Family Planning and Maternal and Newborn Health. New York: Three Decades of Population Policies and Programs. Washington, DC: World Bank; 2007; Accessed; 23/1/22014.
- 20. Alkema L1, Kantorova V, Menozzi C, Biddlecom A. National, regional, and global rates and trends in contraceptive prevalence and unmet need for family planning between 1990 and 2015: *a systematic and comprehensive analysis. Lancet.* 11 May 2013; 381 (9878):1642-52. Doi: 10.1016/S0140-6736(12)62204-1. Accessed, 29.6.2014.
- 21. Jones J, Mosher W, Daniels. Current Contraceptive Use in the United States, 2006–2010, and Changes in Patterns of Use Since 1995.National Health statistics report, N 60, October 18, 2012.Accessed, 13.07.2014.
- 22. Alkema L, Kantorova V, Menozzi C, Biddlecom A. National, regional and global rates and trends in contraceptive prevalence and unmet need for family planning between 1990 and 2015: a systematic and comprehensive analysis. Accessed on 09. 08.2014.
- 23. United nation, Department of Economic and Social Affairs Population division, Fertility and Family planning. Available from internet:https://www.google.com.tr/?gfe\_rd=cr&ei=oo\_HU9S7PMPa8 gfjwoDYBQ&gws\_rd=ssl#q=United+Nations+Department+of+Econo mic+and+Social+Affairs%2C+2002)contraceptive+prevalence+in+afg hanistan .Accessed on 4.7.2014.
- 24. Turkish Statistical Institute, Printing Division, Ankara July 2013, MTB: 2013-494-10, ISBN 978-975-19-5660-6. Accessed on 19. 07. 2014.
- 25. World health statistics 2012.Part 3 Global health indicators page no 96-104. Available from internet address: http://www.who.int/gho/publications/world\_health\_statistics/EN\_WH
  S2013\_Part3.pdf; Accessed; 19/11/2013.

- 26. Afghanistan, central statistics organization (CSO), Statistical year book2012-2013, area an administrative population. Available from:
  - http://cso.gov.af/Content/files/Area%20and%20Administrative%20an d%20Population.pdf; Accessed on 07.107. 2013.
- Rasouli Z, Reproductive health in Afghanistan, the Buddha's Empty Place, may29, 2012, PP 1-15. Accessed on 06 .07.2014.
- 28. Huber D, Saeedi N, Samadi A Kh. Achieving success with family planning in rural Afghanistan; *Bull World health organ*. Mach 2010, 88(3): P 227-232.Accessed on 08.07.2014.
- 29. World health statistics 2013.Part 3 Global health indicators page no 96-104.Available from;

internet;http://www.who.int/gho/publications/world\_health\_statistics/ EN\_WHS2013\_Part3.pdf; Accessed on 19. 08.2014.

- 30. Islamic Republic Of Afghanistan Ministry Of Public Health Prepared by Reproductive Health Task Force July 2012. Available from internet address; http://www.nationalplanningcycles.org/sites/default/files/count ry\_docs/Afghanistan/reproductive\_health\_policyenglish151201314267 10553325325.pdf. Accessed, 25.07.2014.
- Oglesby W H. Perceptions of and preferences for federally funded family planning clinics, Reproductive Health 2014, 11:50. Accessed, 10.07.2014.
- 32. Office of Population Affairs (OPA): Title X Family Planning. http://www. hhs.gov/opa/title-x-family-planning/index.html. Accessed, 12.07.2014.
- 33. Department of Obstetrics, Gynecology, and Reproductive Biology and Division of Women's Health, Brigham and Women's Hospital, Boston, Massachusetts 02120, USA. rallen@partners.org. the role of family planning in poverty reduction. Obstet Gynecol. 2007 Nov; 110(5):999-1002.Accessed, 15.07.2014.
- Muwonge M. Family planning saves lives & improves health. *Fact Sheet* 2012. Available from internet address,

http://www.countdown2015europe.org/wpcontent/upLoads/2012/07/IP PF\_FactSheet-4\_Health.pdf. Accessed on 12.07.2014.

- 35. Jabbari H , Bakhshian1 F, Velayati A, Mehrabi E, Allahverdizadeh Sh, Alikhah H, Ahdieh Maleki A , Ahadi H R , Ghorbaniyan M, Mohammad ,Behzad M N. Effectiveness of presence of physician and midwife in quantity and quality of family planning services in health care centers; J Family Community Med. Jan-Apr201, 21(1): P 1-5. Accessed on 10.07.2014.
- 36. The Planned Parenthood, History and Successes, 2011, available athttp://www.plannedparenthood.org/about-us/who-we-are/historyand-successes.htm. Accessed on 01.08.2014.
- Judith G. Waxman, Privacy and Reproductive Rights: Where We've Been and Where We're Going, 68 *Mont. L. Rev.* 299, 299 (2007). Accessed on 02. 08.2014.
- 38. Waxman, supra note 20, at 301. "The movement that first coalesced around the term 'birth control,' coined by Margaret Sanger in 1915, was composed of people fighting for their own immediate needs, and for that reason it had an intensely personal dimension for its participants." *Gordon, supra note 20*, at 138. Accessed .02.08.2014.
- Planned Parenthood, A History of Birth Control Methods, supra note 21. Accessed. 30.07. 2014.
- 40. Primrose s. The Attack on Planned Parenthood: A Historical Analysis. Accessed. 30.07.2014.
- 41. Taheri S, Ehsanpour S, Kohan Sh. A comparative study on managers', staffs' and clients' viewpoints about organizational and structural obstacles in family planning counseling in health-care centers in Isfahan in 2012; *Iran J Nurs Midwifery Res.* 2014 Mar-Apr,19(2):PP 180-186. Accessed, 09.07.2014.

- 42. Abdel T N, Rama R S. Do improvements in client-provider interaction increase contraceptive continuation? Unraveling the puzzle. *Patient Educ Couns*. 2010; 81:381–7.Accessed, 12.07.2014.
- 43. Sedgh G, Singh S, Henshaw SK, Bankole A. Legal abortion worldwide in 2008: levels and recent trends. International Perspective on Sexual and Reprod Health. 2011 Jun; 37(2):84-94. Doi: 10.1363/3708411. Accessed, 13.07.2014.
- 44. Jones J, Mosher WD and Daniels K, Current contraceptive use in the United States, 2006–2010, and changes in patterns of use since 1995, National Health Statistic report, 2012, No.60,

### <http://www.cdc.gov/nchs/data/nhsr/nhsr060.pdf>, Accessed 20.07.2014.

45. World Health Organization; Maternal, newborn, child and adolescent health May 2013. Available from internet address:

http://www.who.int/maternal\_child\_adolescent/topics/maternal/adoles cent\_pregnancy/en/. Accessed, 20.07.2014.

- 46. Reproductive Health Country Profiles-World Bank. Afghanistan at a Glance April 2011. Accessed. 29. 07.2014.
- UNFPA; Adolescent pregnancy in Eastern Europe and Central Asia. 2013. Accessed.30.07.2014.
- Montoucheta G, Trussellb J. Unintended pregnancies in England IN 2010: costs to the National Health Service (NHS). NIH Public Access. 2013 February; 87(2): P149–153. Doi: 10.1016. Accessed, 13.07.2014.
- 49. Singh S, Sedgh G, Hussain R. Unintended pregnancy: worldwide levels, trends, and outcomes. Studies in family Plan. 2010 Dec; 41(4): P 241-50. Accessed, 14.07.2014.
- Population Reference Bureau. Family Planning Worldwide 2013 Data Sheet. Available from internet address;

http://www.prb.org/pdf13/family-planning-2013-datasheet\_eng.pdf. Accessed, 20.07.2014.

- 51. Tsui A. Family planning spurs development in Asia. East Asia Forum Economics, Politics and Public Policy in East Asia and the Pacific. 27th April, 2013.Accessed, 15.07.2014.
- 52. Carr a B, Gates b M F, Address A M E, Shah R. Giving women the power to plan their families; *The Lancet*, *Volume* 380, Issue 9837, 80 - 82, 14 July 2012.doi:10.1016/S0140-6736 (12)60905-2.Accessed, 13.07.2014.
- 53. Darroch J E, Singh S. Trends in contraceptive need and use in developing countries in 2003, 2008, and 2012: an analysis of national surveys. *The Lancet*: May 18, 2013 (Vol. 381, Issue 9879, P 1756-1762). Accessed, 17.07.2014.
- 54. Mir A M, Shaikh G R. Islam and family planning: changing perceptions of health care providers and medical faculty in Pakistan. *Glob Health Sci Pract* August 12, 2013vol.1no.2p.228-236.Accessed, 16.07.2014.
- 55. Rich countries pledge \$2.6bn for family planning in global south. Global development. Wednesday 11 July 2012 17.17 BST. Available from internetaddress;http://www.theguardian.com/globaldevelopment/2012/j ul/11/rich-countries-pledge-family-planning-women. Accessed.17.07.2014.
- 56. Cleland J, Bernstein T, Ezeh A, Faundes A, Glasier A, Innis J. Family planning the unfinished agenda. World Health Organization, Sexual and Reproductive Health 3 .Accessed, 16.07.2014.
- Sato M. Challenges and Successes in Family Planning in Afghanistan. MSH occasional paper no. 6 2011. Accessed on 20.09.2014.
- 58. Calhoun L M, Speizer LS, Rimal R, Sripad P, Chatterjee N, Achyut P and Nanda P. Provider imposed restrictions to clients' access to family

planning in urban Uttar Pradesh, India: a mixed methods study. *BMC Health Services Research* 2013, 13:532. Accessed on 11.10.2014.

- 59. Population, Fertility and Family Planning in Pakistan: A Program in Stagnation.Research Commentary volume 3, issue 3 October 2011. Accessed on 10.10.2014.
- 60. Central Statistics organization (CSO) and UNICEF (2012). Afghanistan Multiple Indicator Cluster Survey. Accessed; 02.09.2014.
- 61. Islamic Republic of Afghanistan Ministry of Public Health,

Afghanistan national health accounts with subaccounts for reproductive health 2011–2012. Accessed, 02.08.2014.

- Elizabeth L M. Afghanistan, Against the Odds: A Demographic Surprise (Environmental Change and Security Program Report Vol. 14, Issue 1, 2012). Washington, DC: Woodrow Wilson International Center for Scholars. Accessed, 04.08.2014.
- 63. Ghafoori A R, Haqiqatpal G R, Bakhtani N. Present State of Food and Agricultural Statistics in Afghanistan: Country Paper presented at Asia and Pacific Commission on Agricultural Statistics (APCAS) held in Siem Reap, Cambodia, 26 April, 2010. Accessed, 30.07.2014.
- 64. Congress library, Country profile Afghanistan. (2008) available on: http://www.lcweb2.loc.gov/frd/cs/profiles/Afghanistan.pdf. Accessed, 28.07.2014.
- 65. Fact Sheet UNICEF: Afghanistan Country Office. Education .November 2011. Available from internet address:

http://www.unicef.org/infobycountry/files/ACO\_Education\_Factsheet\_-\_November\_2011\_.pdf. Accessed, 29.07.2014.

66. Roberts A. Khost Province District Studies. Courage service,
INC. Cultural& Geographic Research. Update 20 May 2013. Accessed, 26.07.2014.

- 67. Ministry of Rural Rehabilitation and Development (MRRD)-Afghanistan, National Area Based Development, Provincial profile, Available from http://mrrd.gov.af/en/page/69/7353. Accessed on 10.09.2014.
- Ministry of Public Health. Afghan Public Health Institute, Afghanistan Mortality survey 2010. Accessed, 04.09.2014. available;

#### http://dhsprogram.com/pubs/pdf/FR248/FR248.pdf. Accessed on

12.09.2014

- 69. Pandey S, Thakkar H, Rawat CMS, Jha SK and Awasthi S. Sociodemographic factors influencing family size among rural area population of district Nainital, Uttarakhand. Indian Journal of Community Health, Vol 24, No.4, Dec-2012. Accessed on 12.09.2014.
- Women and Men in Afghanistan the last hand book on Jun 2012.
   Available from

# http:/cso.gov.af/Content/file/Last%20HANDBOOK%200N%20WOM EN%20AND%20 MEN%20IN%AFGHANISTAN

JUNE%202012)1.pdf. Accessed on 11.09.2014.

 Republic of Afghanistan, Afghanistan national development strategy, Khost Development plan chapter one and consultations end result August-2007. Available;

# https://ronna.apan.org/PDP/PublicDocuments/Khost%20PDP.pdf. Accessed on 05.09.2014.

72. Rakhi J, Sumathi M, Contraceptive Methods: Needs, Options and Utilization. *The Journal of Obstetrics and Gynecology of India* (November–December 2011) 61(6):626–634, DOI 10.1007/s13224-011-0107-7. Accessed, 09.07.2014.

- Fnguídanos A G, Calle M E, Valero J, Luna S, Rojas V D. Risk factors in miscarriage: a review. *Eur J Obstet Gynecol Reprod Biol*. 2012 May 10; 102(2):111-9. Accessed on 12.09.2014.
- 74. Lawn J E, G Gravett M G, Nunes T M, Rubens C E and Stanton C. Global report on preterm birth and stillbirth (1 of 7): definitions, description of the burden and opportunities to improve data. Lawn et al. *BMC Pregnancy and Childbirth* 2010, 10(Suppl 1):S1. Accessed on 13.09.2014.
- 75. Bozkurt1 A I, Özcirpici B, Ozgur S, Sahinoz S, Sahinoz T, Saka G, Ceylan A, Ilcin E, Acemoglu H, Palanci Y, Akkafa F and Ak M. Induced abortion and effecting factors of ever married women in the Southeast Anatolian Project Region, Turkey: a cross sectional Study. *BMC Public Health 2004*, 4:65 doi: 10.1186/1471-2458-4-65. Accessed on 13.09.2014.
- Ministry of Public Health. Afghan Public Health Institute, Afghanistan Mortality survey 2010. available;

http://dhsprogram.com/pubs/pdf/FR248/FR248.pdf. Accessed on

09.09.2014.

77. Turkey Demographic and Health survey (NNSA) 2008. Hacettepe University, institute of population studies, Oct 2011. Publishing no: NEF-HU.09.01; ISBN978-975-491-274-6. Available;

http://www.hips.hacettepe.edu.tr/tnsa2008/. Accessed on 10.09.2014.

- 78. World health statistic part III-Global health indicator, health services, 2012.Available;http://www.who.int/healthinfo/EN\_WHS2012\_Part3.pd f?ua=1. Accessed on 04.09.2014.
- 79. Raheel1 H, Karim M S, Saleem S and Bharwani S. Knowledge, Attitudes and Practices of Contraception among Afghan Refugee Women in Pakistan: A Cross-Sectional Study. *PLoS ONE* 7(11): e48760.

doi:10.1371/journal.pone.0048760. Accessed on 14.09.2014.

 80. Guttmacher Institute, Fact Sheet June 2014. Contraceptive use in United States. Available;

#### http://www.guttmacher.org/pubs/fb\_contr\_use.html. Accessed,

10.09.2014.

- Republic of Tajikistan, Ministry of Health. Demographic Health Survey 2014. Accessed on 12.09.2014.
- 82. Azmat S K, Shaikh T B, Hameed W, Mustafa Gh, Hussain W,

Asghar J, Ishaque M, Ahmed A, Bilgrami M. Impact of Social Franchising on Contraceptive Use When Complemented by Vouchers: A Quasi-Experimental Study in Rural Pakistan. *PLoS ONE* 8(9): e74260. doi:10.1371September 12, 2013. Accessed on 11.09.2014.

- Jabeen M, Gul F, Wazir F and Javed N. Knowledge, attitude and practices of contraception in women of reproductive age, *Gomal Journal of Medical Sciences July-December* 2011, Vol. 9, No. 2. Accessed on 10.09.2014
- Nisrat N, Yuosuf S, Baloach R, Mumtaz F. Knowledge, prevalence and factors associated with never used and discontinuation of contraception. *Medical channel Vol.* 16, No. 1, March 2010. Accessed on 13.09.2014.
- Agha S .Intentions to use contraceptives in Pakistan: implications for behavior change campaigns. *Agha BMC Public Health* 2010, 10:450. Accessed on 12.09.2014.
- Gubhaju B. The Differential Impact of Wives' and husbands' education on Contraceptive method choice in Nepal, 1996-2006. *Demographic and health research*, 2008 No.54. Accessed on 08.09.2014.
- 87. Jabeen M, Gul F, Wazir F and Javed N. Knowledge, attitude and practices of contraception in women of reproductive age,2011. Available;

http://www.gjms.com.pk/ojs/index.php/gjms/article/viewFile/472/342. Accessed on 10.09.2014.

- Mahawar1 P, Anand S, Raghunath D and Sanjay Dixit. Contraceptive knowledge, attitude and practices in mothers of infant. National journal of Community Medicine 2011, volume 2 Issu1.ISSN: 09763325. Accessed on 12.09.2014.
- Sarmad R, Akhtar Sh and Manzoor Sh. Relationship of female literacy to contraceptive use. Biomedica Vol. 23- Jun. 2007. Accessed on 15.09.2014.
- Kumar M, Meena J, Sharma S and Poddar A. Contraceptive Use among low-Income urban Married. *Indian journal* 2009. DOI: 10.1111/j.1743-6109.2010.02047.x. Accessed on 11.09. 2014.
- 91. R Aryeetey, Kotoh1 AM and Hindin M J. Knowledge, Perceptions and Ever Use of Modern Contraception among Women in the Ga East District, Ghana. *Journal of Reproductive Health* December 2010; 14(4): 27. Accessed on 20.09.2014.
- 92. National Institute of Population Studies (NIPS) [Pakistan] and ICF International. 2013. Pakistan Demographic and Health Survey 2012-13. Islamabad, Pakistan, and Calverton, Maryland, USA: *NIPS and ICF International*. Accessed on 17.09.2014.
- 93. Abdel Aziem A. Ali A, Rayis D A, Mamoun M and Adam I. Use of family planning methods in Kassala, Eastern Sudan. Ali et al. BMC Research Notes 2011, 4:43. Accessed on 23.09.2014.
- 94. Sychareun V, Hansana V, Somphet V, Xayavong S, Phengsavanh A and Popenoe R. Reasons rural Laotians choose home deliveries over delivery at health facilities: a qualitative study. *BMC Pregnancy and Childbirth* 2012, 12:86. Accessed on 18.10.2014.
- 95. Tilahunl T, Coene G, Luchters S, Kassahun1 W, Leye E and Temmerman M. Family Planning Knowledge, Attitude and Practice among Married Couples in Jimma Zone, Ethiopia. *PLoS ONE* 8(4): e61335.doi:10.1371/journal.pone.0061335, 2013. Accessed on 18.10.2014.

- 96. Kamal S M and Hassan H Che. Socioeconomic Correlates of Contraceptive Use among the Ethnic Tribal Women of Bangladesh: Does Sex Preference Matter? *Journal of Family and Reproductive Health* Vol. 7, No. 2, June 2013. Accessed on 17.10.2014.
- 97. Ali S, Rozi, M and Mahmood A. Prevalence and Factors associated with practice of modern Contraceptive Methods among currently Married Women in District Naushahro Feroze. Accessed on 2.10.2014.

### ANNEXES

Region	Important cities	Provinces	
Northern provinces	Mazar-e-sharif	1. Badakhshan 2. Baghlan 3. Balkh 4. Faryab 5. Jowzjan	6. Kunduz 7. Samangan 8.Takhar 9. Sar-e-pol
Western provinces	Heart	1. Badghis 2. Farah	3. Ghor 4. Herat
South western provinces	Kandahar	1. Helmand 2. Kandahar 3. Nimroz	4. Uruzgan 5. Zabol
Eastern provinces	Jalalabad	<ol> <li>Konar</li> <li>Laghman</li> <li>Nangarhar</li> <li>Nuristan</li> </ol>	5. Paktia 6. Paktika 7. Khost
Central provinces	Kabul the capital of Afghanistan	<ol> <li>Bamian</li> <li>Ghazni</li> <li>Kabul</li> <li>Kapisa</li> </ol>	5. Logar 6. parwan 7. wardak 8. Panjsher
Total		34	

# Annex 1. Afghanistan Districts and Province s

### Annex 2. Survey form

# Prevalence of Family Planning methods among married women aged 15-49 years, in one rural area (Nadarsha Kot District) of Khost Province of Afghanistan

Questionnaire Form

Date-----/ 2014

Beginning time-----/-----.Ending time------/-----.

Form No-----

Village name-----

Dear Participant!

This study is design to determine the Prevalence of family planning methods in Nadarsha Kot District of Khost Province. In order to achieve the targets of this study, kindly answer all the questions fully correctly as possible. The information obtained will only be used for Research purpose.

Dr.Tajmalook Samim

### HOUSEHOLD RECORD FROM Married Women Aged 15-49Years

	Name	age	Eligible person interviewee
1			
2			
3			
4			
5			

A1. How old are you?

-----Age.

A2. Have you ever attended school? 1. Yes A3.What is the highest level have you attended? 1. Primary school 2. Secondary school 3. High secondary school 4. University or more ------A4. Did you graduate (receive Diploma) from any above mention education level? 1. Yes 2. No SKIP TO QA.6

2. No

A5.Can you read and write letter and newspaper? 1. Yes 2. No

A6. Do you currently have a job which you have earned money?

1. Yes

2. No

A7. How many people are you living with in your family? ------people

A8. Who are they? (Specify)

A9. Is this your first marriage?

1. Yes

### 2. No

\_\_\_\_\_

A10. How old were you when you got married? -----years old.

A11. What is the duration of your marriage? --

-----years.

SKIP TO Q A.14

2.10		
A12.How many times did you get?		
times.		
A13. How old were you when you first got		
married?		
years old.		

A14. Do you married with relative?

1. 1. Yes

2. No

A15. If yes with whom? -----

A16. How old is your last husband?

------ Age.

A17.Has he ever attended School?

1. YES

2. No



A20.Can he read ar	nd write letter	
and newspaper?		
1. Yes	2. No	
3.I don't know		

A21. Does he currently have a job which he has earned money?

- 2. Yes
- 3. No

4. I don't know

A22.Comparing with your neighbors how is your socio economic status?

1. Very low

- 2. Low
- 3. Medium
- 4. High
- 5. Very high

A23.Do you have any chronic disease diagnosed by a physician?

2. Yes	2.No	SKIP TO QA.25
A24.If yes, which diseases?		
A25. Have you ever been preg	gnant?	
1. Yes		2.No
¥		Ļ
A26.How many times?		A27.Why you have never been pregnant?
		1.New married
	-	2.I don't like
		3. My husband don't like
		4.Other(specify)
		SKIP TO QA.43

A28 .Do you have live children?

1. Yes

2. No

A29. How many?	A30.When do you plane to have a child?
	Skip to 43

A31.Have you ever had missed abortion by yourself (without any interruption)?

1. Yes 2.No .

A32.If yes, how many?

\_\_\_\_\_

A33.Have you ever given a live birth?

1. Yes

2.No

A34.If yes how many? -----

A35.Have you ever had still birth?

1. Yes 2.No SKIP TO QA41

A36. If yes, how many?

-----

A37. Have you ever had a pregnancy that ended in a induce abortion?

1. Yes 2. No

A38.If yes, how many? -----

A39.	A39. When did your last pregnancy end?				
		Months/ years ago.			
A40.	Whe	re did you give your last birth?			
	1.	At home.			
	2.	Government Hospital			
	3.	Maternity hospital			
	4.	Private clinic			
	5.	Other(specify)			
A41.	A41. Who assisted your last delivery? (Could be more than one choice)				
	1.	No one			
	2.	Doctor			
	3.	Nurse /midwife			
	4.	Traditional midwife			
	5.	Relative /friend			
	6.	Other(specify)			
		ATTENTION! IF THE WOMAN GAVE BIRTH IN A HEALTH FACILITY,			
	SKIP TO QA.43				

A42- What was the **main** reason for not giving birth in a health facility?

- 1. No reason
- 2. Accessibility problem
- 3. Happened suddenly
- 4. Problem in using Health center expensive Traditional /custom
- 5. Shame
- 6. Fear
- 7. Don't know
- 8. Others(specify)------
- A43. Have you ever heard about family planning?
  - 1. Yes (IF yes, which methods have you heard about?)
  - 2. No  $\longrightarrow$  skip to Q A.60

Attention! First, check all methods which woman have stated in the first column.

Methods	Check all methods, stated by the woman	A44. From whom did you heard about this	A45. Have you used this method until now?	A46. Are you still using this method? 1. Yes	A47. From where did you obtain this method?	A48. How long have you been using this method?
		method?	1. Yes 2. No	2. No		
Oral Pill			Yes No	YES No		
injection			Yes No	YES No		
Male condom			Yes No	YES No		
Female condom			Yes No	YES No		
Intrauterine device (IUD)			Yes No	YES No		
Emergency contraception			Yes No	YES No		
Implant			Yes No	YES No		
Tubal ligation/Female sterilization			Yes No	YES No		
Diaphragm/ Foam/jelly			Yes No	YES No		
Vasectomy/ male sterilization			Yes No	YES No		
Lactational Amenorrhea			Yes No	YES No		
Rhythm			Yes No	YES No		
Withdrawal (coitus interruptus)			Yes No	YES No		
Post coital douche			Yes No	YES No		
Other (specify)			Yes No	YES No		

# Then Ask QA.49-Q.50 FOR EACH METHOD SEPERATELY.

A49. (Could be more than one choice)

50. (Could be more than one choice)

- 1. Health worker
- 2. Friends
- 3. Television

- 1. Public health center
- 2. Maternity home
- 3. Private Doctor/Clinic

		5. Community nealth Worker (CHW)
	ATTENTION! CHECK THE TABLE .IF THE WO	OMAN USE ANY METHOD,.
A51.Why	you are using this method? (Specify)	
A52.Who	decided to use the current contraceptive method?	
1.	Herself	
2.	Husband	
3.	Together	
4.	Others(Specify)	
A53.Wou	ld you like to use a different method of contraception	n than the one you are currently using?
1. Y	ES	
2. No	)	
A54.If ye	s, what is the reason for changing the current method	l? (Specify)
A55.Wha	was the first method that you ever used?	
1.	Pill	9. Vasectomy/male sterilization
2.	Injectable	10. Emergency contraception
3.	Male condom	11. Locational amenorrhea
4.	Female condom	12. Diaphragm/Foam/Jelly
5.	Tubal ligation /female sterilization	13. Rhythm

6. Implant

7. Intrauterine device (IUD)

8. Post coital douche

14. withdrawal(coitus interruptus)

15. Other (specify)-----

A56. Are you planning to use any contraceptive method to postpone or avoid pregnancy anytime in the future?

9.	1. Yes	2. No
	3.I Don't know	
A57. Whi	ch method?	
A58.Why	you are using this method?	
A59.What	t is the <b>main</b> reason that you don't use at	ny methods? (Could be more than
One choic	e)	
1.	Doctor doesn't advice.	8. Don't know how to use it
2.	Expensive	9. Husband opposed
3.	Not available /accessibility problem.	10. Religion reasons
4.	Hard to find here.	11. Side effect
5.	Don't know how to obtain.	12. Want more children
6.	Breast feeding	13. Having No sex
7.	Other(specify)	

A60.Do you know a near place where family planning services are offered?

1. Yes

2. No

A61.Have you ever used family planning services from there?

- 1. Yes
- 2. No

A62.If no, why haven't you used services from there? ------

THANK YOU FOR YOUR CONTRIBUTION TO OUR STUDY

### Annex 3.

Name of the villages				
Larem kalai	Pikee kalai	Seewai		
Kikha	Lalami Kot	Spikoon		
Shinkalerm	Lar nawee Kot	Kalander		
Lataki	Dakhee lalmai kalai	Kaprai mianz kalai		
Shambawaat	Dakhee sahra kalai	Kaprai abas kalai		
Midrace kalai	Kandi kalai	Ghorwishtai		
Khujrim	Dakhee zor kalai	Dowishta		
Chirmishkai	Almara kandaw kalai	Bar nawee Kot		
Wam	Almara faizullah kalai	Mirgorrai		
Loora	Gidawara	Chaparkay		
Sahra kalai	Melwai kalai	Bugh		
Jaga kala	Meshken	Manzaka		
Paas kala	Tarakai	Walemanda		
Almara bait khan	Ghundai			
Ainzerkai	Palosai			
Kaprai ghondai kalai	Kannai			

Annex 4. Research Comittee Approvel leter

Islamic Republic of Afghanistan Ministry of Higher Education Sheikh Zayed University



#### RESEARCH PROJECT ASSESSMENT REPORT

Meeting Date: 20.03.2014 Thursday

Meeting No.: 45/40

Project No.: 4/5

Decision No.: 8/10

The Project proposal headed "Prevalence of family planning methods among married women aged 15-49 years in one rural area(Nadersha Kot District) of Khost Province of Afghanistan Wich is also the title of thesis of Tajmalook Samim, under the Supervision of "Prof.Dr.Bahar GÜÇİZDOĞAN" Was discussed in the Research committee of Sheikh zayed University Khost - Afghanistan and approved the above mentioned issue for Tajmalook Samim.

M
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Prof. Dr.Badshahzar Abdalli Assistant Prof.Dr. Zahir Gul Mangal
Assistant Prof.Dr. Wali Gul Mokhles Assistant Prof.Dr. Ezatullah
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<i>!!</i>