Trends in modern contraceptive use and factors associated with current use in Zambia: Evidence from DHS data 1992 – 2014

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Key Words: Trends; Modern contraception use; DHS Data; Urban-Rural; Zambia

Abstract

1. Introduction

Promotion of modern contraception is important for the reduction of maternal mortality. In 2014, the modern contraceptive prevalence rate for all women age 15-49 in Zambia was 33% increasing from 25% in 2007 and 19% in 2001. However, the pace of increase has been slow. The national target for modern contraceptive prevalence rate is 58% by 2015.

Recent available data proves that the attention and resources directed toward improving family planning programs in developing countries have been decreasing, even though need remains high. This can be seen through the increasing number of women with no access to family planning. According to the Population Bureau Report of 2004, more than 100 million women worldwide remain without access to family planning, and many times that number do not receive other essential reproductive health services. This is particularly true in the world's poorest region, sub-Saharan Africa, where almost a quarter of women still lack family planning services and information. Statistics show that for the region as a whole, only 14% of women are using modern methods of contraception (ibid). Zambia is no exception as the contraceptive prevalence rate for modern method for all women is about 33% (CSO, 2015).

The fifth millennium development goal seeks to address improvement of maternal health. At the fourth International Conference on Population and Development, held in Cairo, Egypt, it was discussed that countries with the highest levels of mortality should aim to achieve by 2005 a maternal mortality rate below 125 per 100,000 live births and by 2015 a maternal mortality rate below 75 per 100,000 live births. However, all countries were to reduce maternal morbidity and mortality to levels where they no longer constitute a public health problem (ICPD, 2005). It has been argued that maternal health is closely related to the reproductive health of the woman, family planning, the use of contraception methods, and the active participation of the partner (Honduras, 2003: 39).

2. Study Objective

To assess the trends in modern contraceptive use and factors associated with modern contraception use in Zambia.

3. Methods and Materials

This study uses the Zambia Demographic and Health Survey (DHS) data, collected in 1992, 1996, 2001/2002, 2007, and 2013/2014. The DHS surveys included nationally representative samples of (7060 women in 1992, 8,021 women in 1996, 7,658 in 2001 and 7,146 in 2007, and 16,411 in 2013-14). The samples covered all women aged 15-49 years.

Trend analysis of proportions of contraception use was performed on the data. Bivariate analyses using Pearson chi-square test and Multivariate analysis using logistic regression model were performed. All analyses were adjusted for the multi-stage sampling design and were weighted. All analyses were performed using Stata version 13.0.

4. Results

The findings of the study have revealed that even though modern contraceptive prevalence rate has increased overtime, the prevalence rate in 2014 for all women age 15-49 is still about 25 percentage point below the national target for 2015. The results for the 2013-14 DHS presented in table 1 show that the gap in uptake of modern contraception has narrowed between urban and rural areas (35% and 31% respectively).

Table 1: Percent distribution of all women age 15-49 currently using modern contraceptive methods, Zambia 1992-2014

	Urban	Rural	Total
Year	CPR %	CPR %	CPR %
	(Modern methods)	(Modern methods)	(Modern methods)
1992	10.8	2.9	7.0
1996	17.0	6.5	11.2
2001	27.4	13.1	18.6
2007	27.1	22.7	24.6
2014	34.7	30.6	32.5

Analysis of modern contraceptive prevalence uptake by demographic and socio-economic characteristics show that residence, employment status and education level influence modern contraceptive use among Zambian women in reproductive age. In multivariate analysis using odds ratios, the main factor influencing contraceptive use is education level, followed by residence, employment status and age.

Table 2: Percent distribution of all women currently using modern contraceptive methods by background characteristics

Background characteristic			Study Sampl	es	
Age	1992 (n=7,060)	1996 (n=8,021)	2001/2 (n= 7,658)	2007 (n=7,146)	2013/14 (n=16,411)
15-24	3.8	8.3	13.2	17.5	20.6
25-34	9.7	14.2	26.5	32.9	44.1
35-39	12.7	15.2	23.9	29.6	42.1
40-44	10.1	15.8	20.5	25.1	38.2
45-49	6.4	8.0	7.9	17.6	22.1
Residence					
Urban	10.8	17.0	27.4	27.1	34.7
Rural	2.9	6.5	13.1	22.7	30.6
Education					
No education	2.6	4.3	7.9	23.0	28.0
Primary	4.9	9.1	16.2	23.9	33.7
Secondary	13.9	16.6	26.4	24.6	31.1
Higher	42.7	41.6	41.5	34.8	39.9
Employment Stat	tus				
Working	9.4	12.8	19.5	27.3	35.7
Not working	4.7	9.8	17.4	21.4	28.8

Table 2 Continued					
Religion					
Catholic	7.6	12.5	17.4	23.6	32.0
Protestant	6.7	10.9	19.2	24.9	32.7
Muslim	18.3	6.1	18.3	27.6	28.4
Other	7.1	9.3	6.9	13.7	18.9
Marital status					
Never married	2.2	5.7	7.6	8.7	9.8
Currently married	8.9	14.4	24.8	32.7	44.8
Formerly married	7.1	7.4	10.5	17.5	23.6
Number of children					
None	1.1	4.3	5.8	6.1	4.0
1	6.8	11.3	18.0	24.8	34.0
2	9.0	15.6	23.3	33.5	44.2
3	10.9	15.3	25.5	34.3	47.1
4+	10.7	14.5	18.6	31.7	42.8
Total	7.0	11.2	18.6	24.6	32.5

5. Conclusion

The findings of the study reveal strong associations between employment status and contraceptive use. Hence, indicating that economic empowerment of women significantly affects contraceptive use. Another important conclusion is with reference to age which indicates that contraceptive use increases with increase in age and hence provides the age group that requires effective interventions.

In order to improve contraceptive use, the Zambian government should: Enhance the provision of education and employment opportunities for women which will in turn increase knowledge, access and use of modern contraceptives. Enhance and sustain reproductive health programs in which health care providers ensure all women in reproductive age in both rural and urban areas are well informed on benefits of modern contraceptive use.

Acknowledgements

Authors thank the MEASURE Evaluation and Zambia Central Statistical Office staff for providing us with all the DHS dataset and report from 1992 up to 2014.

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