Determinants of LARC Usage in Women in Latin America and the Caribbean

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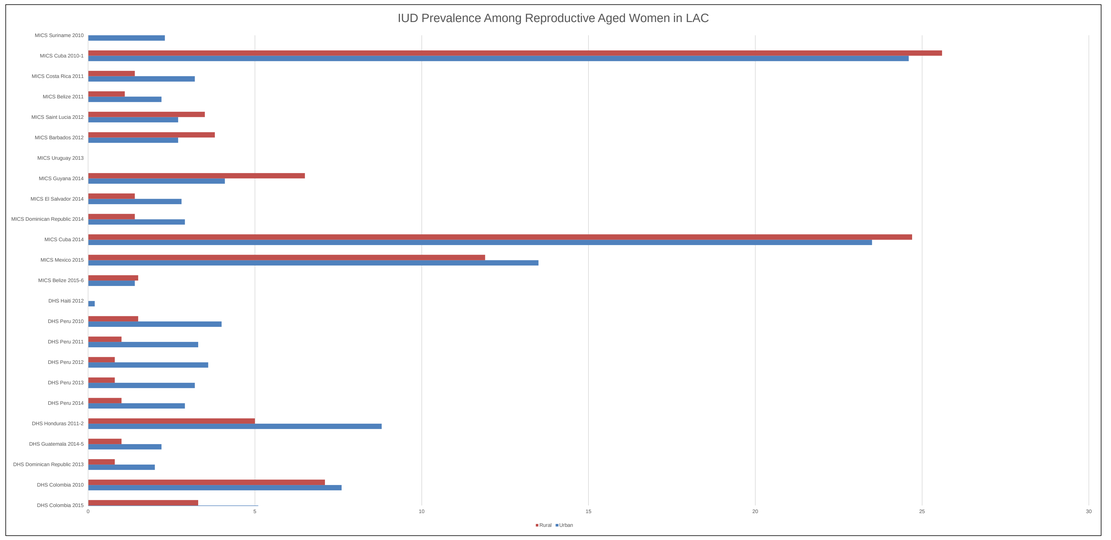
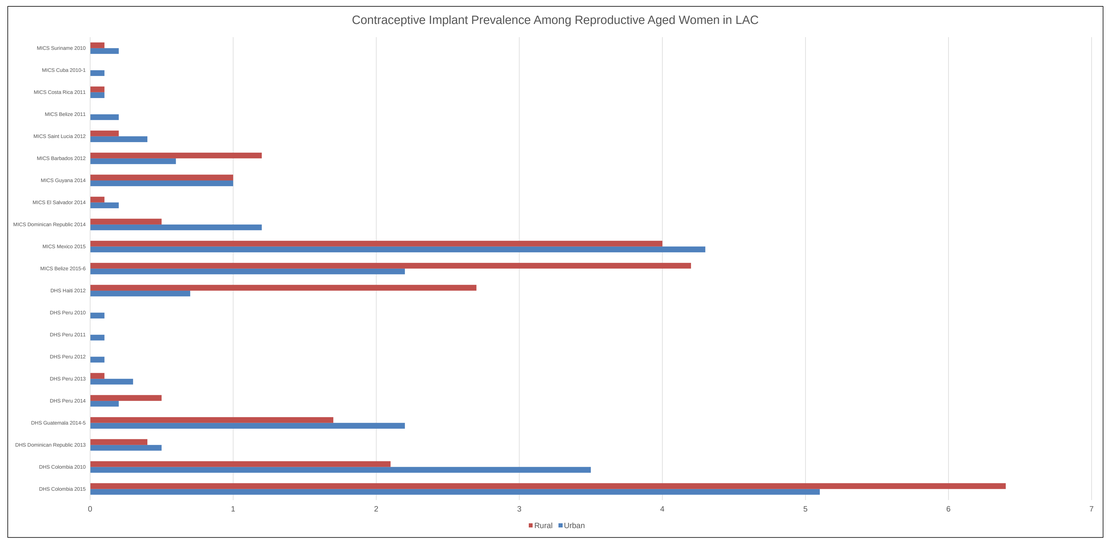
Abstract

Research question: What is the difference in prevalence of LARCs between women living in urban and rural areas of Latin America and the Caribbean (LAC)? *Background, significance, and rationale*: While LARCs have been shown to be effective, approved for long duration of use, and cost-effective there is an unmet need for this type contraception in rural areas. The LAC region has a need for improved family planning services, evidenced by the high percentage of maternal deaths due to unsafe abortions. *Methods*: Demographic and Health Surveys (DHS) and Multiple Indicator Cluster Surveys (MICS) conducted between 2010 and 2015 in LAC countries were reviewed and analyzed to determine difference in prevalence of LARC use between women living in urban versus rural areas. Additionally, a systematic literature review was performed resulting in selection of 11 primary research articles evaluated for LARC prevalence and sociodemographic factors associated with LARC use. *Results*: Both the survey data analysis and systematic review showed a general trend of greater LARC prevalence in urban compared to rural areas. A variety of sociodemographic factors have been correlated with IUD prevalence in these studies. *Conclusions and Impact*: The major trend identified in this two-part review is an overall increased prevalence of LARC use in urban areas compared to rural areas in Latin America and the Caribbean. While a few studies identify factors associated with LARC use, further research may help further elucidate these factors.





Results

Twenty-four DHS and MICS surveys from 16 LAC countries met criteria and were analyzed. The surveys report LARC use among reproductive age women and showed an overall trend of greater prevalence of LARC use in urban compared to rural women. IUD use ranges from 0.2% to 24.6% in urban areas and 0% to 25.6% in rural areas while implant use ranges from 0.1% to 5.1% in urban areas and 0% to 6.4% in rural areas.

The literature search resulted in eleven articles meeting stated criteria. IUD prevalence was generally greater in urban areas and ranges from 1% to 42.3% except for one study which only included women currently using a LARC (IUD 96.5%). This review showed a relative lack of results for current implant use.

Discussion and Conclusions

Most of the study populations (including surveys and papers identified in the systematic review) show that IUD use is more prevalent in women living in urban areas compared to women in rural areas. Trends in contraceptive implant use in urban versus rural areas are similar to trends in IUD use. While none of the studies identified in the systematic review report differences between urban and rural use of the contraceptive implant, the DHS and MICS surveys show that the percent implant use is higher in urban areas versus rural areas for most of the populations studied. There is a lack of studies reporting sociodemographic factors' influence on LARC use.

Introduction

LARCs, including IUDs and the subdermal implant, are highly effective, cost-effective, and have a long-approved duration of use, making them ideal family planning methods for women living in rural areas. However, previous studies suggest that social ties to urban areas is positively correlated with knowledge about modern contraceptives. The LAC region has the highest prevalence of maternal deaths due to unsafe abortions globally and surveys of women in the area indicate there is an unmet need for family planning services here. This review evaluated the difference in prevalence of LARCs between women living in urban and rural areas of LAC and assessed the determinants of use of LARCs within these populations.

Methods

This study was conducted in two parts. First, DHS and MICS conducted between 2010 and 2015 in LAC countries were reviewed and analyzed to determine the difference in prevalence of LARC usage between women living in urban versus rural areas.

Second, a systematic review related to determinants of LARC usage in LAC was conducted using the following databases: PubMed, EMBASE, POPLINE, WHO Global Index Medicus, and LILACS. The primary outcome extracted was current use of a LARC and independent variables extracted and assessed included sociodemographic factors. Articles included reported the primary outcome, were available in full text, and were available in English. Articles were excluded if they were not primary research articles and did not include current use of a LARC.

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