The effect of abortion legalization on fertility in Mexico[1]

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---Preliminary Version----

Abstract

Abortion legalization within the federal district of Mexico in 2007 turned Mexico City into the largest jurisdiction in Latin America, outside Cuba and Puerto Rico, to permit women to have abortions on demand during the first trimester of pregnancy. The implications for fertility behavior have not been investigated. In this paper, we rely on metropolitan area differences in changes in fertility rates are used to identify the effect of abortion legalization on fertility between 2000 and 2010. The effects are estimated using difference-in-difference regression methods that include control for changes in other socioeconomic conditions also related to fertility. We specifically elaborate on the differential effect of the law across age specific groups. Result document that abortion legalization did affect fertility rates although the effect varies by age group and parity. Moreover, abortion legalization did not overcome the tendency for teenage childbearing to increase in Mexico. We discuss the policy implications of our findings.

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The early decades of the twenty first century confront Latin American countries with new reproductive health dilemmas. Even though fertility levels have declined rapidly in most countries of the region other dimensions that accompanied the fertility transition in other contexts have not kept pace. Two in particular are central to population policy discussions and women's health. The first one is the early initiation of childbearing. Despite considerable reductions in the number of children women have, the timing of childbearing is still concentrated at relatively young ages and teenage fertility has not been declining as steadily as overall fertility. The second one is high levels of unplanned and unwanted fertility. Despite considerable expansion of contraceptive use, unsatisfied demand for contraception remains an obstacle to fertility regulation at all ages. Together, the concerns highlight the need for original family planning and population policy initiatives that can facilitate the completion of the fertility transition in the region.

Mexico is a case in point. The total fertility rate (TFR) in Mexico declined from 6.5 in 1970 to 2.2 in 2010 (Mier y Teran & Partida, 2001). The main contributor to this decline was the rapid expansion of contraceptive use especially female sterilization at higher parities (Lerner & Quesnel, 1994). However, despite the sharp drop in overall fertility the age pattern of childbearing remains young, with the mean age at first child staying virtually unchanged between 1992 and 2006 (20.9 and 21.3 years of age, respectively (OECD, 2009). Moreover, as many as 16 percent of Mexican women have their first child before age 18, and the share of births to teenage mothers increased from 17.1 to 19.2 between 2000 and 2011 (Guzman, Rodriguez, Martinez, Contreras, & Gonzalez, 2006; Juarez, Palma, Singh & Bankole, 2010). Between 1980 and 2004, the fertility rate among 20-24 year old women declined 42 percent compared to a much lower 27 percent among teenagers.

In addition, unplanned and unwanted childbearing remains prevalent across all ages. In 2009, 34 percent of all pregnancies were reported as unplanned/unwanted. Unplanned/unwanted pregnancies are particularly high among teenagers (42 percent). However, even among 30-34 year-old women 29 percent of pregnancies were reported as unplanned/unwanted. The representation is actually higher (37 percent) among women 35 and older. Distinguishing unplanned from unwanted fertility highlights the differential meaning of

unsatisfied demand for contraception over the life-course. While unplanned pregnancies decline with age, unwanted childbearing actually moves in the opposite direction. Among women between the ages of 30-34 and 35 and older, 14.4 and 32 percent of pregnancies were reported as unwanted, respectively (CONAPO, 2011).

A byproduct of the limitations in women's capacity to control their reproduction has been the reality of induced abortion. While illegal in all of Mexico for most of the country's history, induced abortions accompanied the fertility transition. Estimates of the extent of the practice vary widely. For 1997, CONAPO (2000) estimated that as many as 102,000 abortions were performed in the country with 19 percent of ever-pregnant Mexican women reporting having had an abortion (induced or spontaneous) at least once in their lives. The percentage declined to 15.3 percent in 2006 (Mendoza, 2006). At the upper end, Juarez et al. (2008) estimated the number of induced abortions as ranging from 725,000 to 1 million in 2006. It is estimated that between 6-8 percent of maternal mortality resulted from complications caused by clandestine induced abortions.

In 2007, in part as a response to the reality of induced abortion as well as pressure from feminist organizations and other advocates of women's health, the federal district of Mexico legalized the practice. The change in policy turned Mexico City into the largest jurisdiction in Latin America outside Cuba and Puerto Rico to permit abortions on demand to women during the first trimester of pregnancy. Several studies have investigated the consequences of legalized abortion for women's health and maternal mortality (Olavarrieta etal., 2012; Schiavon, Troncoso & Polo, 2012; Becker etal., 2011a; Becker etal., 2011b; Mondragon y Kalb etal., 2011; Maldonado, 2010). However, the impact of legal access to abortion on childbearing and reproduction has yet to be assessed. Even though abortion has long been regarded as a proximate determinant of fertility, the extent to which legalization affects fertility levels and the age pattern of childbearing has not been evaluated in the Latin American context.

In this paper we take advantage of differences in policy conditions between Mexico City and other metropolitan areas to evaluate the consequences of abortion legalization for fertility rates. Specifically, we rely on difference in difference specifications to compare changes in overall and age-specific fertility rates between 2000 and 2010 across metropolitan areas to

assess the extent to which Mexico City departs from the rest of the country. In addition, we also evaluate changes in parity-specific fertility rates, both at lower and higher parities, to distinguish the effect of abortion legalization on the initiation of childbearing and stopping behavior. We derive implications for the potential impact of the extension of legalized abortion for the completion of the fertility transition in other areas of Latin America.

Background: Legalized abortion in Mexico City and fertility implications

Despite being illegal, indirect estimates show that induced abortion was widely practiced throughout Mexico prior to the Mexico City reform. In 2006, the national abortion rate was estimated at 33 per 1,000 women aged 15-44,[2] which was 74 percent higher than in the United States (19 per 1,000) and 83 percent higher than in Puerto Rico[3] (18 per 1,000 in 2001). In response to political forces, including advocacy from feminist groups and public health statistics on the high toll of illicit abortions on maternal health, in April of 2007 the Mexico City legislature decriminalized elective abortion in the first 12 weeks of pregnancy.[4] The law mandates that abortion be available to women in the Federal District of Mexico Ministry of Health facilities in the city, free of charge for Mexico City residents and on a sliding fee scale for residents of other areas of the country. The fee depends on socioeconomic status with the maximum fee equivalent to approximately 100 U.S. dollars (Becker & Diaz Olavarrieta, 2013). Moreover, there are at least two clinics that provide abortion services for free to all women, further reducing the economic barriers to the procedure (Mondragon y Kalb et al., 2011). The one exception to the relatively easy access to abortion relates to minors. Girls under 18 must obtain written parental or guardian consent and a parent or guardian must accompany her at her visits. Since abortion legislation in Mexico is made at the state level, the policy transformed the Federal District into the only geographic area within Mexico where abortion could be legally performed.

[2] The methodology for producing these estimates has been recently questioned (see the exchange between Koch and colleagues and Singh and colleagues in Ginecol Obstet Mex (2012)). Irrespective of its incidence, there is consensus that clandestine induced abortion was a reproductive health problem in Mexico. Survey data shows that at least 20 percent of Mexican women had at least one abortion and clandestine abortion has been directly linked to maternal mortality.

[3] http://www.johnstonsarchive.net/policy/abortion/ab-puertorico.html

[4] For details regarding the political process leading to abortion legalization see Kulczycki (2007, 2011).

The impact of the law was far reaching. By 2012 more than 100,000 accumulated abortions had been performed in the District's Ministry of Health hospitals. As the policy became more established the number of yearly abortions has been increasing, from 13,404 in 2008 to 20,485 in 2012. The impact of the legislation has slowly been reaching women in other areas of Mexico. In 2008, 76; 21, and 3 percent of the women receiving abortion services were residents of the Federal District, The State of Mexico, and other areas, respectively. By 2011, the composition has slightly changed, with 71; 25; and 6 percent of the women receiving abortion services being residents of the Federal District, The State of Mexico, and other areas, respectively (GIRE, 2013).

Several studies have examined the impact of establishing a public sector legal abortion program on numerous dimensions of women's health. These studies have shown that the program is providing high-quality services to clients (van Dijk etal., 2011). Most of the procedures were performed free of charge (70%) and relying increasingly on safer abortion methods for first trimester procedures. In 2011, 74 percent of procedures were medical abortions with women self-administering the abortion pill in the privacy of their own home and with limited complications. In addition, studies have found that women are receiving high-quality post-abortion contraceptive services and counseling for the prevention of unintended pregnancies. Results show that the most common contraceptive method accepted by women after abortion is IUD (29%) followed by the pill (11%) and injectable methods (5%). An additional 6.9 percent chose condoms and only 16 percent chose no method. Since the establishment of the program, only 2.1 percent of women have had more than one procedure.

Mondragón y Kalb and colleagues (2011) analyzed the patient characteristics and services following abortion legalization. They document that modal age for women receiving an abortion is between 20 and 24 years (36%). Only 5 percent of abortions were performed on women under age 18 and 12 percent among women 18 or 19 years of age. A significant number of abortions were performed to women 30 years or older (24.9%). Their results suggest that abortion might be connected with parity specific fertility control at lower and higher parities; 32.5% of abortions were performed on women with no children and 41.1 percent among women with 2 or more children. Even though the majority of women are not in union at the

time of abortion (60.8%) a sizeable 40.2% performed the procedure while in a union. Similarly, while most clients had relatively low levels of education (40.1 percent completed 9 or fewer years of formal schooling), 20.8 percent had 13 or more years which is only slightly lower than the percent of women with higher education in the federal district (25.2%). Thus overall, the evidence suggests that the policy is reaching a wide range of the Mexican population.

Abortion legalization, though, especially in Catholic countries, is a highly contested issue. Only 37 percent of Mexico City residents supported allowing for elective first-trimester abortion in 2007 but support for the legislation increased to 74 percent in 2009 (Wilson etal., 2011). At the other end, following the passing of the legislation, 16 Mexican states have amended their constitutions to state that life begins at conception (GIRE, 2012). According to reports, in the State of Guanajuato between 2000 and 2008, 130 women were reported to the authorities for criminal prosecution after suffering complications from clandestine abortions and 20 pregnant rape victims were denied the procedure even though it is allowed according to the Penal Code. In one case, the victim continued with the treatment in the Federal District[5]. The number of women facing penal charges related to illegal abortions increased from 62 to 226 for the 1992-2007 and 2009-2011 periods, respectively[6]. The debate is ongoing. State level constitutional amendments restricting abortion have been challenged in court but the practice is far from being recognized as a reproductive right. Much of the advocacy for the procedure has been framed in terms of women's health; i.e. as a policy necessary to reduce maternal mortality and other complications resulting from its criminalization.

Abortion and fertility rates

Irrespective of ideological and political positions or how one evaluates the desirability of the procedure, abortion is a form of fertility regulation that directly affects childbearing. Its role has long been recognized in the proximate determinants of fertility model that includes induced abortion as a mechanism to regulate fertility in addition to marriage, postpartum infecundability, pathological sterility, and contraception (Bongaarts, 1987). Considerable research has documented the impact of abortion on fertility levels in the international context. In the U.S. it is estimated that abortion legalization led to a 5-8 percent decline in birthrates

[5] http://www.jornada.unam.mx/2009/03/10/index.php?section=estados&article=030n1est
[6] http://www.zocalo.com.mx/seccion/articulo/aumenta-el-aborto-en-mexico-1373808425

with the largest declines occurring among teenagers, women older than 35, and unmarried women (Levine etal., 1999). In Europe, studies found that fertility rates declined more rapidly in countries where abortion is legal and part of comprehensive family planning programs (David, 1992). Across four Latin American countries, Johnston and Hill (1996) estimated that induced abortion reduced fertility by 38-55 percent in the 1990s.

Its effect might be especially important in contexts of advanced but not fully completed fertility transitions. [7] At the early stages of the transition, reductions in family size can be somewhat rapidly achieved through declines in the costs of contraception, especially female sterilization, and diffusion of ideas about smaller family size. The latest stages of the transition, however, can be more problematic since they require much higher levels of birth control. At these last stages, in addition to continuing the decline in overall fertility, contraception becomes increasingly important for affecting the timing of fertility as well as the coincidence between desired and actual childbearing. For Mexico and other Latin American countries, with relatively low birth rates, abortion legalization can be an important mechanism moving women away from the constrained fertility regulation choices available at the early stages of the fertility transition which were vividly described as: "to practice clandestine abortion, get sterilized, or continue with an undesired pregnancy" (Berquó, 1999, p. 125). Thus, whether intended in its original design or not, the passing of abortion legalization in the Federal District of Mexico in 2007 provided women with an additional form of contraception not available in other areas of the country.

Building on the international experience we expect the effect of abortion on fertility to express variably on different dimensions of childbearing including overall fertility reduction, age at first child, and stopping behavior. In order to assess its effect the analysis compares changes in fertility rates in the Federal District relative to other metropolitan areas in Mexico. We focus both on changes in overall and parity specific age fertility rates.

Data and methods

Data for the analysis come from the 10 percent sample of the 2000 and 2010 Mexican Census (INEGI, 2011). We calculate overall and according to parity age-specific fertility rates for

[7] http://www.un.org/esa/population/publications/completingfertility/completingfertility.htm

60 metropolitan areas, including the Federal District. Overall fertility rates are computed dividing the total number of birth to women of a certain age by the total number of women of the same age. Parity specific fertility rates are computed dividing the number of first, second, third, or forth or higher births to women of a certain age by the total number of women of the same age.

The statistical analysis estimates difference-in-difference models to assess whether fertility behavior was affected by abortion legalization in the Federal District as compared to other metropolitan areas in Mexico. The models are specified as followed.

The dependent variable in the models is the difference in age specific fertility rates between 2010-2000 in a given metropolitan area. The main explanatory variables are geographic indicators. They include a dummy variable indexing the Federal District. In addition, since there it is possible and there is some evidence that the effect of abortion legalization might have extended to areas geographically closed to the Federal District, we also include a dummy variable indexing the Metropolitan Area Surrounding the Federal District. Finally, we include a dummy indicator indexing whether a metropolitan area is residing in a State the amended the constitution to restrict the possibility of abortion legalization.

The model also include dummy indicators for each of the age groups under consideration and a control for the age specific fertility rate in 2000 since prior fertility levels affect the size of the change that can be expected between 2010 and 2000. The difference-in-difference specification accounts for fixed differences between metropolitan areas. However, to account for changes in socioeconomic conditions during the period that might not be accounted for in the DID specification the model controls for the change in mean household income, percent in female labor force participation, percent of women with secondary education or more, and percent of women in union.

The variable of interest in our analysis is the dummy indicator for the Federal District and the surrounding area since they reflect the independent effect, net of other socioeconomic factors, of changes in policy conditions on age-specific fertility rates. However, it is likely that the effect varies across age groups. Accordingly, in addition to DID models we estimate difference-in-difference-in-difference models of the form,

The models share the specification of the DID model. However, they add interaction terms between the geographic indicators and the dummy variables indexing specific age groups. To the extent that the policy change differentially affected the fertility rates of women of different ages the interaction terms capture those differences. Since information is clustered within metropolitan areas we estimate robust standard errors based on heteroscedastic consistent covariance matrix (HC3), which has been recommended for small sample cases (Long & Ervin, 2000).

The same specification is extended in analysis of parity specific fertility rates.

Preliminary results

Table 1 reports the change in age-specific fertility rates between 2000 and 2010 in the Federal District, adjacent SMA areas, cities that passed constitutional amendments restricting abortion, and the rest of the cities in Mexico. These trends contextualize the results from our model estimates. It is worth noting that Mexico City started the period with fertility rates much lower than the rest of the country, which affects how much fertility can change between 2000 and 2010. The TFR for the city was 2.014 in 2000 which was much lower than for the rest of the country. By 2010 Mexico City exhibited below replacement fertility levels.

Table 1 also documents the tendency for teenage childbearing to either slightly increase or remain stable in Mexico. Between 2000 and 2010 the fertility rate among women between the ages of 14-17 increased 0.007 in Mexico City. A similar change is evident in the adjacent metropolitan area (0.006) as well as in states with constitutional amendments (0.005) and other cities (0.007). Fertility declined somewhat pronouncedly among women between the ages of 20-34. But no clear pattern emerges from the description. It is unclear the extent to which the changes in Mexico City differ from other contexts once we control for initial fertility levels and other socioeconomic conditions.

Table 2 reports results from multivariate models predicting change in overall age specific fertility rates between 2000 and 2010. Model 1 reports estimates from difference-in-difference models. Results show that compared the change in age specific fertility rates in the Federal District between 2000 and 2010 was -0.007 point lower as compared to other metropolitan areas. In terms of the total fertility rate the effect implies that the TFR rates in the Federal

District would have been 14 percent higher if abortion had not been legalized. There is also evidence that abortion legalization is affecting fertility rates in the surrounding areas outside the Federal District. Model 1 shows that in these areas the change in fertility rates was -0.004 lower than in other areas which implies an 8 percent lower fertility rates as compared to contexts without abortion legalization.

Model 2 investigates the extent to which the effect varies across age groups. Estimates for the interaction terms between Mexico City and age groups show that abortion did not significantly affect the change in fertility for 14-17 year old women. This is not to say that there is absolutely no evidence of an effect. The coefficient for the interaction is -0.006. While negative it is considerably lower than the estimate for older groups. The coefficients for women 18-19, 20-24, 25-29, and 30-34 are -0.022; -0.029; -0.028; and -0.014, respectively. A main implication of the age trend is that it suggests that restriction in access to abortion to 14-17 year old women, specifically the requirement for parental consent and adult supervision, are affecting the changes in fertility they experience. These restrictions are an important consideration for understanding the potential of abortion for affecting fertility initiation and teen-age childbearing.

Results for the interaction terms between residence outside Mexico City and age show that only women in advance ages considerable reduced their fertility in connection with abortion legalization. Specifically, women between the ages of 20-24, 25-29 and 30-34 experience a -0.007, -0.009 and -0.00075 fertility reduction relative to older women. Again, results highlight limits to the extent to which abortion reaches the fertility of younger women.

Table 3 expands the analysis by parity and documents significant age patterns in the extent to which abortion affected initiation and stopping behaviors.

Table 1. Age-Specific Fertility Rates, Mexico, 2000 and 2010

	Mexico City			SMA			Cities Const. Mod.			Other Cities		
Age groups	*2000*	*2010*	*Diff*	*2000*	*2010*	*Diff*	*2000*	*2010*	*Diff*	*2000*	*2010*	*Diff*
						ASFRs						
14-17	0.017	0.024	0.007	0.025	0.030	0.006	0.026	0.031	0.005	0.026	0.033	0.007
18-19	0.072	0.071	-0.001	0.098	0.101	0.003	0.105	0.106	0.001	0.096	0.099	0.003
20-24	0.108	0.093	-0.015	0.146	0.137	-0.009	0.156	0.132	-0.024	0.142	0.127	-0.015
25-29	0.110	0.087	-0.023	0.134	0.111	-0.024	0.154	0.124	-0.031	0.145	0.119	-0.027
30-34	0.088	0.071	-0.017	0.097	0.079	-0.018	0.112	0.088	-0.025	0.107	0.093	-0.014
35-39	0.046	0.042	-0.004	0.050	0.039	-0.011	0.057	0.044	-0.014	0.052	0.045	-0.008
40-44	0.011	0.012	0.001	0.016	0.011	-0.005	0.022	0.013	-0.009	0.016	0.013	-0.002
45-49	0.002	0.001	0.000	0.003	0.003	0.000	0.004	0.002	-0.002	0.004	0.001	-0.002
TFR	2.014	1.741	-0.273	2.503	2.194	-0.309	2.815	2.315	-0.500	2.600	2.289	-0.312

Source: 2000 and 2010 Mexican Census Samples.

Table 2. Models predicting the change in ASFR between 2000 and 2010. Mexico

	Model 1			Model 2		
	Coeff.		*S.E.*	*Coeff.*		*S.E.*
Metropolitan areas: (reference: Other areas)						
Mexico City	-0.007	**	(0.003)	0.004	**	(0.002)
SMA	-0.004	*	(0.002)	-0.003		(0.002)
Other States' constitution modifications	-0.003	**	(0.001)	-0.003	**	(0.001)
Age groups						
14-17	0.036	**	(0.003)	0.036	**	(0.003)
18-19	0.086	**	(0.005)	0.087	**	(0.005)
20-24	0.106	**	(0.005)	0.107	**	(0.005)
25-29	0.098	**	(0.005)	0.099	**	(0.005)
30-34	0.075	**	(0.004)	0.075	**	(0.004)
35-39	0.042	**	(0.003)	0.042	**	(0.003)
40-44	0.019	**	(0.003)	0.019	**	(0.003)
45-49	0.012	**	(0.002)	0.012	**	(0.002)
Prior fertility level						
ASFR (2000)	-0.750	**	(0.028)	-0.754	**	(0.028)
Socioeconomic controls (changes 2000-2010)						
Mean household income	-0.013	**	(0.006)	-0.013	**	(0.006)
Female labor force part.	0.079	**	(0.033)	0.079	**	(0.033)
Secundary education or more (%)	-0.122	**	(0.049)	-0.122	**	(0.049)
In union (%)	0.017		(0.058)	0.018		(0.058)
Interaction terms between local area and age group						
Mexico City * Age group: 14-17				-0.006		(0.008)
Mexico City * Age group: 18-19				-0.022	*	(0.013)
Mexico City * Age group: 20-24				-0.029	**	(0.004)
Mexico City * Age group: 25-29				-0.028	**	(0.005)
Mexico City * Age group: 30-34				-0.014	**	(0.003)
SMA * Age group: 14-17				0.000		(0.014)
SMA * Age group: 18-19				0.003		(0.015)
SMA * Age group: 20-24				0.007	*	(0.004)
SMA * Age group: 25-29				-0.009	*	(0.005)
SMA * Age group: 30-34				-0.007	*	(0.004)
R-Squared	0.458			0.461		

N = 2160

Robust standard errors based on heteroscedasticity consistent covariance matrix (HC3)

** p <0.05, * p<0.1

Source: 2000 and 2010 Mexican Census Samples.

Table 3. Models predicting changes in parity specific fertility rates between 2000 and 2010. Mexico

	FIRST BIRTH		SECOND BIRTH		THIRD BIRTH		FOURTH OR MORE	
	Model		Model		Model		Model	
	Coeff.	*S.E.*	*Coeff.*	*S.E.*	*Coeff.*	*S.E.*	*Coeff.*	*S.E.*
Metropolitan areas: (reference: Other areas)								
Mexico City	0.002 *	(0.001)	0.002 **	(0.001)	0.002 **	(0.001)	0.002 **	(0.001)
SMA	0.000	(0.001)	-0.001	(0.001)	0.000	(0.000)	-0.001	(0.001)
Other States' constitution modifications	-0.002 **	(0.001)	0.000	(0.001)	0.001	(0.001)	-0.001 *	(0.000)
Age groups								
14-17	0.019 **	(0.002)	0.005 **	(0.001)	0.004 **	(0.001)	0.005 **	(0.001)
18-19	0.048 **	(0.004)	0.020 **	(0.002)	0.006 **	(0.001)	0.005 **	(0.001)
20-24	0.039 **	(0.003)	0.044 **	(0.003)	0.016 **	(0.001)	0.008 **	(0.001)
25-29	0.019 **	(0.002)	0.041 **	(0.002)	0.028 **	(0.002)	0.016 **	(0.001)
30-34	0.010 **	(0.002)	0.030 **	(0.002)	0.025 **	(0.002)	0.019 **	(0.002)
35-39	0.004 **	(0.002)	0.015 **	(0.001)	0.014 **	(0.001)	0.015 **	(0.001)
40-44	0.001	(0.002)	0.005 **	(0.001)	0.007 **	(0.001)	0.008 **	(0.001)
45-49	-0.001	(0.002)	0.004 **	(0.001)	0.004 **	(0.001)	0.005 **	(0.001)
Prior fertility level								
ASFR (2000)	-0.613 **	(0.036)	-0.875 **	(0.034)	-0.827 **	(0.032)	-0.883 **	(0.023)
Socioeconomic controls (changes 2000-2010)								
Mean household income	0.001	(0.004)	-0.003	(0.003)	-0.006 **	(0.002)	-0.002	(0.002)
Female labor force part.	-0.008	(0.02)	0.006	(0.019)	0.035 **	(0.013)	0.022 *	(0.013)
Secundary education or more (%)	-0.006	(0.032)	-0.040 *	(0.023)	-0.038 **	(0.018)	-0.077 **	(0.017)
In union (%)	0.074 **	(0.034)	-0.001	(0.031)	0.003	(0.023)	0.017	(0.021)
Interaction terms between local area and age group								
Mexico City * Age group: 14-17	-0.005	(0.007)	-0.002 **	(0.001)				
Mexico City * Age group: 18-19	-0.015 *	(0.008)	-0.006 **	(0.003)				
Mexico City * Age group: 20-24	-0.014 **	(0.005)	-0.014 **	(0.003)	-0.004	(0.002)	-0.002 **	(0.001)
Mexico City * Age group: 25-29	-0.002	(0.003)	-0.013 **	(0.003)	-0.013 **	(0.002)	-0.005 **	(0.001)
Mexico City * Age group: 30-34			-0.006 **	(0.002)	-0.008 **	(0.002)	-0.006 **	(0.003)
SMA * Age group: 20-24					-0.001	(0.002)	-0.006 **	(0.001)
SMA * Age group: 14-17	-0.001	(0.011)	0.001	(0.002)				
SMA * Age group: 18-19	0.002	(0.009)	0.001	(0.005)				
SMA * Age group: 20-24	-0.001	(0.006)	0.005	(0.007)	0.000	(0.003)	0.000	(0.001)
SMA * Age group: 25-29	-0.003 **	(0.001)	-0.001	(0.003)	-0.003 **	(0.001)	-0.001	(0.002)
SMA * Age group: 30-34			-0.003	(0.003)	-0.004	(0.003)	-0.002	(0.002)
SMA * Age group: 35-39					-0.001	(0.002)	-0.002	(0.001)
R-Squared	0.249		0.371		0.431		0.748	

N = 2160

Robust standard errors based on heteroscedasticity consistent covariance matrix (HC3)

** p <0.05, * p<0.1

Source: 2000 and 2010 Mexican Census Samples.

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