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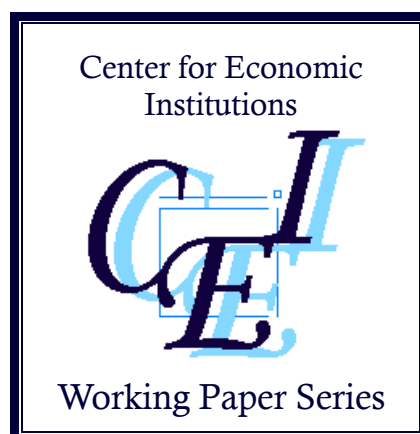
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**“Conflict, Institutions, and Economic Behavior:  
Legacies of the Cambodian Genocide”**

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# Conflict, Institutions, and Economic Behavior: Legacies of the Cambodian Genocide \*

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## Abstract

This paper examines how the Cambodian genocide under the Pol Pot regime (1975-1979) altered people's post-conflict behaviors through institutional changes. Combining spatial genocide data and the 1998 Census microdata, we compare the impacts of the genocide on subsequent investments in children's education between couples who had their first child during and after the Pol Pot era. Because under the Pol Pot regime private ownership was completely denied and spouses and children were owned by the state as collective property, these couples had quite distinct institutional experiences: The former were controlled as family organizations and the latter were not. We find that the genocide adversely influenced children's education among the former couples, but not the latter ones. We discuss plausible mechanisms underlying these patterns, shedding new light on why institutions which emerged during the conflict persistently shaped people's post-conflict behaviors.

JEL Codes: N35, O15, O17, Z13

Key words: conflict, genocide, institutions, education, Cambodia

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# 1 Introduction

The past 15 years have seen a surge in economic research on the causes and economic consequences of war and conflict (see Blattman and Miguel (2010) for a review). “(T)he social and institutional legacies of conflict are arguably the most important but least understood of all war impacts (Blattman and Miguel (2010, p. 42)); few studies, however, have sought to fill this lacuna by empirically examining how institutions emerge during wars/conflicts and how those institutions influence people’s behaviors. This paper examines how a civil conflict altered people’s post-conflict behaviors through institutional changes. We show that the impacts are distinct between two social groups which had different institutional experiences during the conflict and discuss plausible underlying mechanisms with particular attention to the social context. In this way, our study sheds new light on why institutions which emerge during conflict persistently shape people’s behaviors.

We study the Cambodian conflict – the Khmer Rouge’s rule (1975-1979) and the Vietnamese rule and peace process (1979-1998).<sup>1</sup> The armed conflict during the Vietnam War (which started in 1970) ended in April 1975 with the victory of the Khmer Rouge (officially the Communist Party of Kampuchea). The Khmer Rouge led by Pol Pot established the state of Democratic Kampuchea in 1976 and ruled the country until the regime was overthrown by the Vietnamese army in January 1979. The Khmer Rouge implemented its radical “Maoist and Marxist-Leninist transformation program,” which led the entire country into genocide: Approximately two million people died from execution, disease, starvation, or exhaustion (Dy (2007, p. 3)).<sup>2</sup> We study the Cambodian genocide, one of the worst human tragedies of the 20th century (Brecht (1987)), and its institutional and economic legacies.

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<sup>1</sup>Our study does not cover the armed conflict during the Vietnam War (1970-1975). Chandler (2008) provides a description of each of these three conflict periods. Vietnam withdrew its forces from Cambodia in 1989.

<sup>2</sup>According to this estimate, about 27% of the total population – 7.3 million in 1975 (Ross (1998)) died during the Pol Pot regime. Estimates of the number of people who died during the Pol Pot regime vary across studies (e.g., Dy (2007, p. 69)).

North (1990) defines institutions as “the rules of the game in a society,” which consist of ‘formal rules’ (e.g., constitutions, laws), ‘informal rules’ (e.g., norms, codes of conduct, conventions), and ‘their enforcement characteristics.’ The communist revolution by the Khmer Rouge was so radical that these three rules were simultaneously changed; such an institutional catastrophe is very rare in human history.<sup>3</sup>

First, private property was completely denied by the constitution of Democratic Kampuchea (i.e., change in formal rules). This ban included not only material private properties, such as lands, houses, and agricultural tools, but also one’s own family: Spouses and children were owned by the state as collective property (Short (2004, pp. 316–317)). Second, people were forced to conform to the ideologies of the Pol Pot regime (Locard (2004)) (i.e., change in informal rules). Third, those who disobeyed the formal and informal rules of the Pol Pot regime were suspected of being enemies of the society and were sent to reeducation camps and/or executed (i.e., change in the enforcement mechanism). Thus, the Cambodian genocide resulted from the *violence* of the Khmer Rouge in forcing people to follow its rules.

We examine how the Cambodian genocide altered parental investments in children’s education after the collapse of the Pol Pot regime in 1979. We focus on these behavioral outcomes for two main reasons. The first reason is that human capital, a fundamental determinant of countries’ economic performance (e.g., Barro and Sala-i-Martin (2003)), was lost during the Pol Pot era (e.g., Kiernan (2008)) because the Khmer Rouge tried to exterminate all intellectuals in the society (Vickery (1999, p. 39)). Understanding how human capital has been recovered and accumulated since 1979 is crucial to design post-conflict economic policies in Cambodia.

The second reason is that parental behaviors may have suffered from the *institutional inertia* of the Pol Pot regime, as follows. First, the Khmer Rouge not only

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<sup>3</sup>Whereas formal rules can take a relatively short time to change, informal rules and enforcement characteristics which are related to culture usually take much longer time to change (e.g., Hayami and Godo (2005, pp. 9–30)). Roland (2004) defines formal rules and informal rules as ‘fast-moving institutions’ and ‘slow-moving institutions,’ respectively.

persecuted intellectuals and executed many of them, but also denied and abolished formal school education.<sup>4</sup> Although formal school education resumed soon after the Khmer Rouge’s collapse (Vickery (1986, pp. 154–159)), the ideologies regarding the denial of education and intellectuals under the Pol Pot regime may have persistently influenced people’s behaviors regarding children’s education.

Second, as the remnants of the Khmer Rouge continued to fight against the new government army in guerilla warfare until the 1990s, *the threat of violence* by the Khmer Rouge was persistent. Under these unstable social situations, parents may have complied with the Khmer Rouge’s rules for fear that it might recapture power. Indeed, the majority of survivors suffered from long-term mental health disorders, such as post-traumatic stress disorder (PTSD) (e.g., Beth et al. (2011)), implying that the subsequent behaviors might have continued to be constrained by the Khmer Rouge’s ideologies.

To scrutinize this institutional inertia, we compare two types of couples: those who had their first child during the Pol Pot era and those who had their first child after this regime. This is because the two sets of parents had distinct experiences of the complete denial of private ownership, including the state ownership of spouses and children under the Pol Pot regime:<sup>5</sup> The former couples were controlled as family organizations and the latter were not. These two sets of couples thus had distinct social ties with the Khmer Rouge’s society: The former were more strongly ‘embedded’ in the Khmer Rouge’s society than the latter (“historical embeddedness,” Granovetter (1985)), potentially leading to their stronger institutional inertia in their family

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<sup>4</sup>The slogans on the denial of education include the following: “There are no diplomas, only diplomas one can visualize.”; “The spade is your pen, the rice field is your paper.”; “If you wish to pass your Bac, part one and part two, you must build dams and canals.” (Locard (2004, pp. 95–96)).

<sup>5</sup>The slogans on the state ownership of spouses and children include the following: “The Angkar is the mother and father of all young children, as well as all adolescent boys and girls.”; “The Angkar looks after you all, brothers and sisters, mothers and fathers.”; “If parents beat their children, it is a sign they despise the Angkar. Thus, the Angkar will have no compassion at all for them.” (Locard (2004, pp. 107–109)). Here, Angkar means the Khmer Rouge’s top leadership.

decision making.

We utilize two sets of data: (1) the Khmer Rouge historical database developed by the Document Center of Cambodia (DC-Cam), which contains comprehensive and detailed information on the mass killings during the Pol Pot regime with geocoded locations of more than 500 execution sites and the number of victims, and (2) a complete set of the 1998 Cambodia Population Census microdata, which contains the basic information of individual and household socioeconomic characteristics as well as information of latitude and longitude coordinates of villages in the country.

Combining these two sets of spatial point data, we construct binary and continuous measures of couples' exposure to genocidal violence during the Pol Pot regime, with an assumption that couples were more severely exposed to the genocidal violence if they lived in closer proximity to the execution sites where more people were executed.<sup>6</sup> Based on these measures, we estimate separately the impacts of the genocide on children's educational outcomes for couples whose first child was born during and after the Pol Pot era. A notable feature of our analysis is the use of two types of spatial point data: one for 'events' of our interest and the other for subjects exposed to the events.

Since the locations of execution sites were not randomly chosen, our genocide measures constructed from their locations can be endogenous as a determinant of outcomes. Indeed, we show that execution sites were established in relatively developed areas. To address this endogeneity of the location of events, we follow one of Fisher's three principles of experimental designs, "blocking" ("local control"), with the aim of comparing outcomes among more homogeneous groups to reduce bias (Fisher (1935)).<sup>7</sup> Specifically, we limit our original sample to households living around

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<sup>6</sup>Similar violence measures based on spatial data are used by Callen et al. (2014). We have no data on the personal experience of violence during the Pol Pot regime.

<sup>7</sup>Extant works often employ instrumental variable strategy to address the endogeneity of violence (e.g., Miguel and Roland (2011), Rogall and Yanagizawa-Drott (2014)). In our context, it is difficult to find valid instrumental variables which are correlated with the locations of execution sites, but not with children's educational outcomes.

execution sites and then compare children’s educational outcomes among households within the spatial clusters. To bolster identification, we further limit the sample to households living within selected spatial clusters with similar levels of economic development prior to the Pol Pot era.

The analysis reveals a sharp contrast between couples whose first child was born during and after the Pol Pot regime: The genocide adversely altered subsequent investments in children’s education only among the former couples.

We interpret these results as follows. The genocidal violence by the Khmer Rouge triggered *the emotion of fear* among people. The fear prevailed under unstable situations after the collapse of the Pol Pot regime, serving as a key *motivating force* of people’s behaviors through time. Whether the fear was *induced* and *causally* influenced a *specific* behavior, such as investments in children’s education, depended on people’s social ties with the Khmer Rouge’s society. Since couples whose first child was born during the Pol Pot regime were strongly embedded in the Khmer Rouge’s society, they felt a sense of belonging to the Khmer Rouge, thereby being influenced by its ideologies. Thus, their behaviors continued to be susceptible to fear, which was greater for those who were severely exposed to the genocidal violence.

The rest of the paper is organized as follows. Section 2 clarifies our contribution to the literature. Section 3 provides a description of the spatial genocide data. Section 4 discusses the empirical strategy to identify the impacts of the genocide on children’s educational outcomes. Section 5 reports the empirical results, including those for underlying mechanisms, a series of robustness checks, and various heterogeneity analyses. Section 6 interprets the results. Section 7 concludes.

## 2 Related Literature

Our study contributes to five strands of existing literature. The first strand of literature on institutions usually (often implicitly) considers two definitions of institutions: ‘institutions-as-rules’ and ‘institutions-as-equilibria’ (e.g., Alesina and Giuliano

(2015), Greif and Kingston (2011)). On one hand, the institutions-as-rules approach, which follows North’s definition of institutions (described above), treats the rules and the enforcement as separate issues. On the other hand, the institutions-as-equilibria approach treats the enforcement of the rules as endogenous: Focusing on *motivation* provided by the beliefs, norms, and expectations that shape individual behaviors, it carefully explains incentives for individuals to follow the rules and studies the rules and the enforcement within a unified framework (Greif (2006)).

One key advantage of the institutions-as-rules approach is that it is possible to isolate the effects of one specific institution or one type of institution from those of other institutions or other types of institutions. At the same time, extant works on the effects of formal rules often assume that the rules are externally enforced and pay little attention to the type and effectiveness of the enforcement (Greif and Kingston (2011)); extant works on the effects of informal rules (culture) often impose apparently strong assumptions on the transmission of values, beliefs, and/or norms across generations.<sup>8</sup>

Although our study follows the institutions-as-rules approach, distinct from previous studies, we focus on the enforcement (violence) of the rules and try to isolate its effects from those of the rules. Moreover, in choosing our study samples and behavioral outcomes, we pay particular attention to the underlying institutions and social structure. This enables us to explain why and how couples were motivated to comply with the rules of the Pol Pot regime even after its collapse, thus effectively following the institutions-as-equilibria approach. In other words, our study distills the essence of the two institutional approaches.

The second is the recent small, but growing, stream of literature on the relationships among violence, preferences, and behaviors (e.g., Bellows and Miguel (2009), Blattman (2009), Callen et al. (2014), Voors et al. (2012)). The existing econo-

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<sup>8</sup>Guiso et al. (2006, p. 23), for example, define culture as “those customary beliefs and values that ethnic, religious, and social groups transmit fairly unchanged from generation to generation.” This definition is often adopted in empirical works.



metric and experimental studies report significant associations between violence and behaviors and between violence and preferences. Our study shows that the effects of violence on economic behaviors depend on the institutions which emerged during the conflict and the social structure in which individuals are embedded.

The third is the literature that examines the effects of violent conflict on children’s schooling outcomes (e.g., Akresh and de Walque (2011), Alderman et al. (2006), Chamarbagwala and Morán (2011), Dabalen and Paul (2014), Lee (2014), Shemyakina (2011); de Walque (2006), Islam et al. (2016), and Merrouche (2011) study the Cambodian context). These existing works study the effects among children who were of school age, of pre-school age, or in utero during conflict. In contrast, to examine the potentially persistent effects of institutions which emerged during the conflict, we study children who received formal school education after the genocidal violence (most of them were born well after the genocide).

The fourth strand of literature addresses the relationship between political mass killings and subsequent economic performance (e.g., Acemoglu et al. (2011b), Chaney and Hornbeck (2016), Rogall and Yanagizawa-Drott (2014), Waldinger (2010)). The existing works study the change in social structure as a result of mass killings and examine the effects on subsequent economic performance. In contrast, our study focuses on the relationship between direct experiences of the holocaust among individuals and their subsequent behaviors.

The fifth stream of literature investigates the relationship between historical events and economic development (see Nunn (2009, 2014) for reviews). The literature studies historical events, such as European colonization (e.g., Acemoglu et al. (2001, 2002), Dell (2010)), Africa’s slave trade (e.g., Nunn (2008)), and the French Revolution (Acemoglu et al. (2011a)). Although our study captures the effects of a relatively recent historical event, it provides a detailed description of the historical persistence at the micro level, taking into account motivations and incentives that individuals face in the process of social change.

## 3 Killing Sites under the Pol Pot Regime

### 3.1 Genocide Data and Geographic Distribution of Killing Sites

Our study utilizes the Khmer Rouge historical database developed by DC-Cam.<sup>9</sup> DC-Cam conducted a large-scale survey between 1995 and 2004 to comprehend the mass killings during the Pol Pot regime. Covering 121 districts in 21 provinces out of 183 districts in 24 provinces in the country, the survey found 534 execution sites (henceforth, ‘killing sites’) and collected information regarding their locations (latitude and longitude), names, types, and number of remains of victims of execution.<sup>10</sup> Excluding 1 site with no location information and 19 sites with inconsistent location information, we consider the remaining 514 killing sites in our analysis.<sup>11</sup>

Figure 1 depicts the geographic distribution of the 514 killing sites, along with information about victims.<sup>12</sup> The base map corresponds to the 1977 administrative divisions, consisting of seven zones (Northwest, West, Southwest, East, Center, North, and Northeast) and three autonomous regions (Kratie, Mondul Kiri, and Kampong Soam).<sup>13</sup>

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<sup>9</sup>DC-Cam is an independent Cambodian research institute founded by Yale University’s Cambodian Genocide Program in January 1995; it became an independent non-governmental organization in January 1997 (<http://www.dccam.org/>).

<sup>10</sup>The 534 sites are classified as ‘burial’ (278 sites) (including 1 site classified as a ‘killing site’), ‘prison’ (110), ‘burial and prison’ (67), ‘memorial’ (49), ‘burial and memorial’ (15), ‘memorial and prison’ (3), or ‘burial, prison, and memorial’ (12). The information about victims is available for all types of execution sites; thus, executions were conducted in all types.

<sup>11</sup>The 514 killing sites consist of 271 burial, 104 prison, 63 burial-and-prison, 48 memorial, 14 burial-and-memorial, 3 memorial-and-prison, and 11 burial-memorial-and-prison sites.

<sup>12</sup>The number of victims is often reported in intervals and we use the lower bound for analysis. Using the upper bound or median yields similar results. The results are available from the authors upon request.

<sup>13</sup>The geographic information system (GIS) polygon data were developed by the authors based on the digital layer prepared by Yale University’s Cambodian Genocide Program (<http://gsp.yale.edu/case-studies/cambodian-genocide-program>). The 1977 administrative divisions differ from those before and after the Pol Pot regime, with each zone containing two or more provinces or parts of provinces and the three autonomous regions as independent provinces. The administrative divisions in 1973 (before the Pol Pot regime) are largely the same as those in 1998 (after the Pol Pot regime), except for some newly created provinces (e.g., Banteay Mean Chey, which was split off

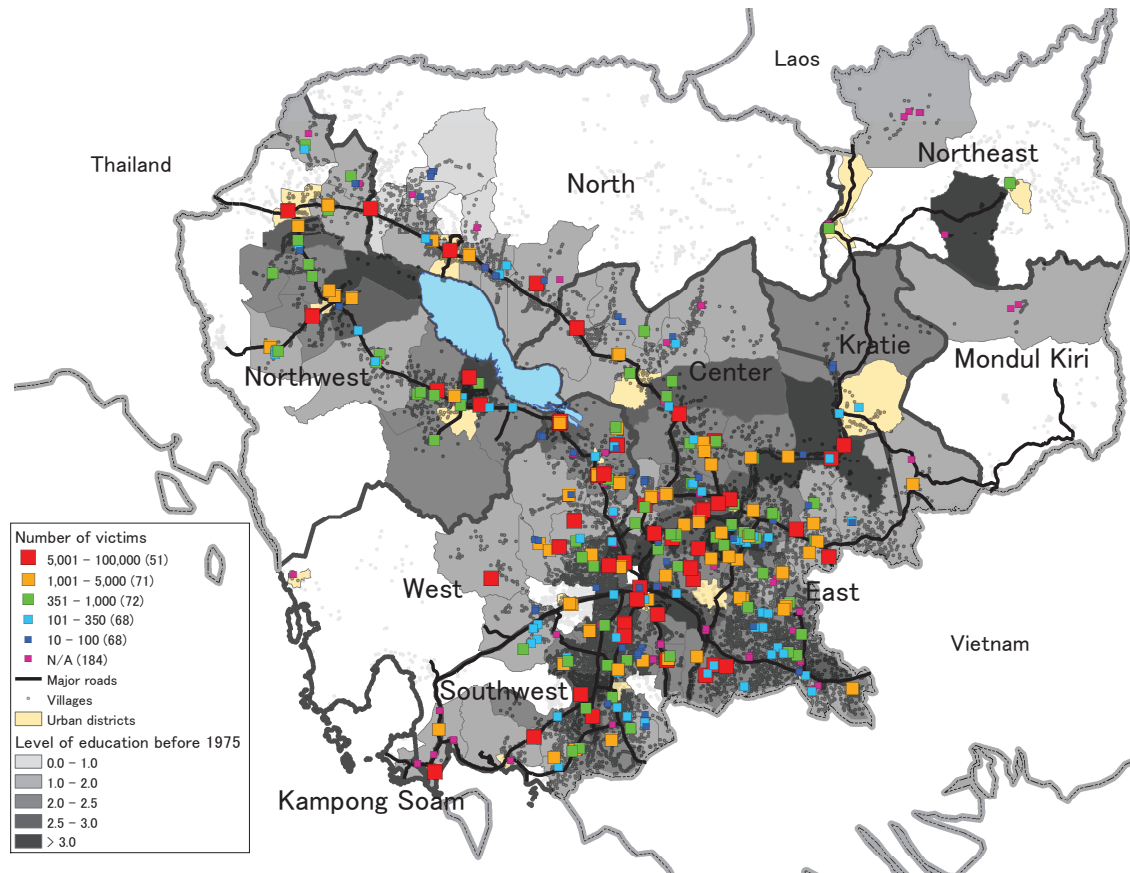


Figure 1: Geographic Distribution of Killing Sites under the Pol Pot Regime

*Notes:* The figure shows the geographic distribution of 514 killing sites and their number of victims in districts surveyed by DC-Cam. The 1977 administrative zones of the Pol Pot regime and the 1998 districts are depicted. The maps include information on the district mean of years of schooling of non-migrant women aged 36-50 who should have finished primary school education, if they received any education, before 1975 and the national and provincial road networks in 1973.

The 1998 district map and village points are also depicted.<sup>14</sup> The districts with a white background are those not surveyed by DC-Cam, most of which are located in

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from Battambang in 1988).

<sup>14</sup>The GIS polygon and point data were obtained from the Geographic Department of the Council of Ministers of Cambodia. The point data include 12,702 village points in all provinces but Phnom Penh. The distribution of villages in 1998 is largely consistent with that during the Pol Pot era; we select all village codes of individuals born before 1974 (one year before the Pol Pot regime began), whose birth villages are the same as those where they lived in 1998, finding that 81% of these villages is matched with the 1998 villages. We substitute the 1998 village point data for those during the Pol Pot era.

remote areas. Killing sites are widely distributed in the surveyed areas. A relatively large number of killing sites is located in the eastern zone (144 sites, about 28%), where a large-scale purge was carried out in 1977-1978 (Kiernan (2008, pp. 205–210)).

## 3.2 Location Determinants of Killing Sites

Although no official government documents exist that explain how killing sites were established under the Pol Pot regime, reports prepared by international organizations and historians provide anecdotal evidence that schools, universities, and government buildings were used as prisons and reeducation camps and trucks were used to transport prisoners to prisons or burial sites (Chandler (1999), Dy (2007, p. 2), Kiernan (2008, p. 316)). This suggests that killing sites were located in areas that were relatively developed before the Pol Pot era.

Figure 1 depicts two measures which should be correlated with the level of regional economic development prior to the Pol Pot era: the national and provincial road networks in 1973 (*major roads*) and the district mean education levels of women aged 36-50 who have never migrated, a cohort that should have finished primary school education, if receiving any education, before 1975.<sup>15</sup> Many killing sites are located near major roads and in districts with relatively high education levels, though those located relatively far from major roads are also common in the eastern and western zones. These relationships are empirically confirmed in Appendix Table A2 (columns 1 and 3).

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<sup>15</sup>The corresponding descriptive statistics are reported in Appendix Table A1. Based on the historical map stored in DC-Cam archives, we develop the 1973 GIS line data from the GIS line data of the 1998 national and provincial road networks. The education system before the Pol Pot regime followed the French 6·4·3 education system (e.g., Nguonly (2004)). We focus on female education because women were relatively less affected by armed conflict during the Vietnam War than men, who were more likely to migrate or join the Khmer Rouge. We focus on females who speak Khmer (Cambodian) as their first language and are Buddhist.

## 4 Empirical Design

### 4.1 Target Population, Study Population, and Study Samples

**Target Population.** Under the Pol Pot regime, people were divided into “new people” and “base people” (see, e.g., Dy (2007, pp. 30–32), Kiernan (2008, p. 164)). In general, urban people were classified as new people and rural people were base people; new people, who were considered enemies of the society, were persecuted, whereas base people, who were considered innocent, were treated relatively favorably.

Urban people were forced to migrate to the countryside in 1975, and many of them experienced forced migration several times during the Pol Pot era (Kiernan (2008)). Our target population is non-migrant base people (rural) couples who were alive in 1998 (i.e., survivors of the Pol Pot regime) and had their first child during and after the Pol Pot era. We exclude new people (urban) couples and base people (rural) couples with migration experience (about 57% of the couples in rural areas) because our genocide measures are based on the points of villages where couples lived in 1998. Examining genocide impacts among migrant couples, which could differ from those among the non-migrant couples examined here, is beyond the scope of this paper.

**Study Population.** Using the complete set of the 1998 Population Census microdata, we define the study population as follows (Appendix Table A3 provides the complete sampling procedure). First, we select households with a mother aged 34-45 whose first child was born in 1977-1982 (i.e., right before and after the breakdown of the Pol Pot regime).<sup>16</sup> Second, we limit these households to non-migrant rural households (i.e., households which resided in rural areas in 1998 and included a husband and wife who had never migrated). Third, we further restrict these households to re-

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<sup>16</sup>We focus on mothers aged 34-45 because the majority of them was married during or right after the Pol Pot regime (National Institute of Statistics (2001, pp. 96–97)). The 1998 Census data do not contain information on the birth order of children. We treat as the first child the oldest child of households in which the number of the mother’s own living children is the same as the number of children living together at the time of the interviews (i.e., no children lived apart from their parents).

duce unobserved factors that may be correlated with children’s educational outcomes. The resulting study population consists of 49,150 households.<sup>17</sup>

**Study Samples.** From the study population, we construct three study samples for our analysis (*Samples I, II, and III*) as follows. Sample I consists of households residing in districts surveyed by DC-Cam (Figure 1). We then restrict samples to mitigate the endogeneity of killing-site locations: Sample II consists of households residing in villages within 6.0 km of killing sites and Sample III is composed of households residing in villages within spatial clusters with similar levels of regional economic development (henceforth *spatially balanced clusters*), as discussed in the next subsection. Samples I, II, and III contain 41,054, 20,956, and 8,302 households, respectively.

We divide each household sample into two groups: households whose first child was born during and after the Pol Pot regime (1977-1979 and 1980-1982). We further divide the latter households into two: those whose first child was born in 1980 and in 1981-1982, the former of which corresponds to a transition period. We analyze these three subsamples separately. Here, we assume that the timing of having the first child is unrelated to the potential impacts of the genocide on children’s educational outcomes.<sup>18</sup> Addressing this potential endogeneity problem, together with that of killing-site location, is beyond the scope of this paper. The comparison of household characteristics between the three subsamples shows almost no significant differences, with the exception being that couples whose first child was born earlier are slightly older, as expected (Appendix Table A6). This provides evidence that the potential endogeneity of the timing of having the first child is unlikely to be a major concern.

**Characteristics of Study Population and Samples.** The descriptive statis-

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<sup>17</sup>Complete information about the variables used in our analysis is available for about 89% of the study population. Appendix Tables A4 and A5 (column 1) provide the descriptive statistics of characteristics of these 43,535 households, their children aged 15-21/18/17 and 6-14, and the villages where they reside.

<sup>18</sup>According to the Cambodia Demographic and Health Survey 2000, the median age at first birth is similar across women aged 25-29 (at 21.5), 30-34 (at 22.3), 35-39 (at 21.6), 40-44 (at 22.4), and 45-49 (at 21.4) (National Institute of Statistics (2001, p. 64)), the last three of which mostly correspond to our sample (women aged 34-45 in 1998).

tics of the study population, Samples I, II, and III are reported in Appendix Tables A4 and A5. The comparison of household and village characteristics across the samples shows that compared to the study population, Samples I, II, and III, especially the latter two, contain households and villages with favorable characteristics (Appendix Table A7) because Samples II and III focus on villages around killing sites, which tended to be located in relatively developed areas (Appendix Table A2). Although caution is needed to interpret the estimates based on Samples II and III in terms of external validity, internal validity is bolstered in these restricted samples.

## 4.2 Spatially Balanced Clusters

This subsection explains how we select spatially balanced clusters with similar levels of regional economic development within clusters.

**Fisher’s Exact Test.** We employ Fisher’s exact test (Fisher (1925)), which is a statistical significance test for independence between two variables, to test the spatial homogeneity within clusters. Since in-migration is generally strongly correlated with regional economic development (e.g., Chen et al. (1998), Mazumdar (1987)), we use the proportion of migrant households as a proxy for the level of regional economic development. Lacking historical migration data, we use the data in the 1998 Census to calculate the migrant proportion as a proxy for the level of regional economic development prior to the Pol Pot era.<sup>19</sup>

The validity of this proxy measure requires the following assumptions: (1) The distribution of the migrant proportion within each spatial cluster based on the 1998

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<sup>19</sup>Directly using the education levels of non-migrant women aged 36-50 as a proxy for the level of regional economic development as we did above (Figure 1) is not feasible because doing so would require us to consider the joint distribution of the education levels and ages (as they are systematically related to each other), which is technically difficult in Fisher’s exact test for the independence/homogeneity between *two categorical variables* (Fisher (1925)). Using the distance from villages to main roads during the Pol Pot era as a proxy for the level of regional economic development is also not feasible because the distance to the road is strongly correlated with the distance from villages to the killing sites, depending on their location relative to the road within spatial clusters.

Census data is the same as that prior to the Pol Pot era;<sup>20</sup> and (2) errors in this proxy are not systematically related to both the locations of killing sites and children’s educational outcomes.

Since it is not feasible to directly assess the validity of these assumptions, we examine the relationships between killing-site locations and pre-treatment village/parental characteristics. Specifically, if the locations of killing sites are correlated with the level of regional economic development, then the former should be positively correlated with the education levels of non-migrant women aged 36-50 and/or the level of parental education; if the errors in the proxy measure are correlated with the locations of killing sites and children’s educational outcomes, then the locations of killing sites should also be correlated with the pre-treatment village and/or parental characteristics. Thus, the locations of killing sites having little correlation with the pre-treatment village and parental characteristics supports the first and second assumptions.

We calculate the migrant proportion based on nuclear households (a different sample from the one for analysis) to attain a better balance, as shown next (Appendix Table A8 provides the complete sampling procedure).<sup>21</sup> The migrant proportion is positively correlated with the locations of killing sites (columns 2 and 4 of Appendix Table A2). For a robustness check, below we also consider other samples to define the migrant proportion.

**Procedures.** We now describe the procedures for selecting spatially balanced

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<sup>20</sup>Although many people were forced to migrate under the Pol Pot regime (e.g., Kiernan (2008)) and fled to Thailand or Vietnam during and after the Pol Pot era (e.g., Robinson (1998)), the political and social environment within spatial clusters should have been similar. This is because the spatial clusters we use are much smaller than the main administrative divisions under the Pol Pot regime – seven zones, each of which consisted of three to seven regions (Dy (2007, pp. 23–25)). For a robustness check, we also consider 4.0 km spatial clusters, as discussed below; the smaller the spatial clusters, the more similar the within-cluster environment.

<sup>21</sup>Using migrant households selected under the same conditions as non-migrant households selected in the study population (Appendix Table A3), except for their migrant status, yields relatively unbalanced results – positive correlations of killing-site locations with the education level of non-migrant women aged 36-50 and parents (columns 1-3 of Appendix Table A10). We consider various samples (Appendix Table A9) based on the test for joint significance of pre-treatment covariates, which is commonly used to test the endogeneity of a variable of interest (e.g., Wooldridge (2010)).



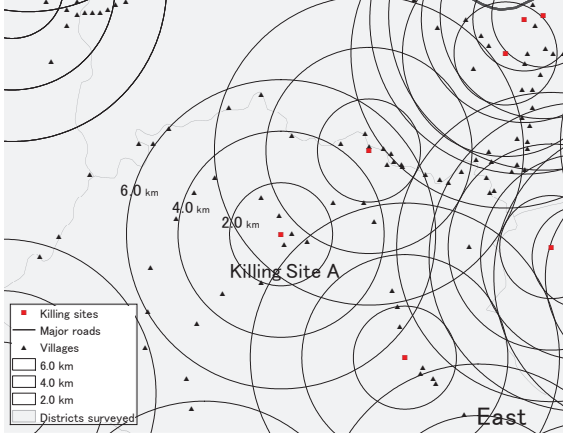


Figure 2: Spatial Clusters

*Note:* The number of villages within 0-2.0 km, 2.0-4.0 km, and 4.0-6.0 km of Killing Site A is 5, 8, and 18, respectively.

Table 1: Results of Fisher's Exact Tests for Killing Site A

|                                                  | Num. of Villages<br>(1) | Non-migrant HHs<br>(2) | Migrant HHs<br>(3) | Total<br>(4) |
|--------------------------------------------------|-------------------------|------------------------|--------------------|--------------|
| A. 1977-1979 (Fisher's exact $p$ -value = 0.001) |                         |                        |                    |              |
| 0-2.0 km                                         | 3                       | 5                      | 1                  | 6            |
| 2.0-4.0 km                                       | 7                       | 14                     | 3                  | 17           |
| 4.0-6.0 km                                       | 14                      | 17                     | 28                 | 45           |
| Total                                            | 24                      | 36                     | 32                 | 68           |
| B. 1980 (Fisher's exact $p$ -value = 0.049)      |                         |                        |                    |              |
| 0-2.0 km                                         | 3                       | 4                      | 6                  | 10           |
| 2.0-4.0 km                                       | 8                       | 13                     | 7                  | 20           |
| 4.0-6.0 km                                       | 17                      | 18                     | 36                 | 54           |
| Total                                            | 28                      | 35                     | 49                 | 84           |
| C. 1981-1982 (Fisher's exact $p$ -value = 0.001) |                         |                        |                    |              |
| 0-2.0 km                                         | 5                       | 13                     | 5                  | 18           |
| 2.0-4.0 km                                       | 7                       | 23                     | 12                 | 35           |
| 4.0-6.0 km                                       | 18                      | 33                     | 62                 | 95           |
| Total                                            | 30                      | 69                     | 79                 | 148          |

*Note:* Fisher's exact  $p$ -values are from two-sided Fisher's exact tests.

clusters. Let us consider a specific case for Killing Site A, depicted in Figure 2. First, using ArcGIS, we create 2.0 km and 4.0 km buffers around each killing site and identify village points within the 0-2.0 km, 2.0-4.0 km, and 4.0-6.0 km buffers of each spatial cluster.<sup>22</sup>

Second, using these village points as identifiers, we identify the non-migrant and migrant households living within the 0-2.0 km, 2.0-4.0 km, and 4.0-6.0 km buffers of each spatial cluster for each subsample of the households whose first child was born in 1977-1979, 1980, and 1981-1982.

Third, for each subsample, we test the homogeneity in the proportion of migrant households across the three buffers using Fisher's exact test.<sup>23</sup> The null hypothesis is that the proportion of migrant households has no association across the three buffers.

<sup>22</sup>Village points located exactly 2.0 (4.0) km from killing sites, if any, belong to 0-2.0 (2.0-4.0) km buffers, not 2.0-4.0 (4.0-6.0) km buffers. Since our analysis uses both binary and continuous genocide measures, the narrower the bandwidth for defining spatial clusters, the better; however, if the bandwidth is too narrow, the number of observations is too small for conducting a statistical test. Based on these considerations, we use a 2.0 km bandwidth.

<sup>23</sup>Fisher's exact test is used particularly when the sample size is small. We do not employ the chi-squared test because in many spatial clusters the three buffers have unequal numbers of households with very low frequencies of non-migrant or migrant households in the cells (see Table 1).

We define spatial clusters as spatially balanced clusters if the null hypothesis cannot be rejected for all three subsamples. To be conservative, for each subsample, we also examine the homogeneity in the proportion of migrant households among households residing in villages within the 0-2.0 km and 2.0-4.0 km buffers of 4.0 km spatial clusters. If the spatially balanced clusters do not have the homogeneous distribution of migrant households within the 4.0 km spatial clusters, then we exclude households living within such spatial clusters from Sample III.

The results of Fisher’s exact tests for Killing Site A are shown in Table 1, where frequency distribution and two-sided Fisher’s exact test  $p$ -values are reported. In all three subsamples, the number of non-migrant households is larger than that of migrant households within the 0-2.0 km and 2.0-4.0 km buffers; the converse holds true within the 4.0-6.0 km buffer. As the null hypothesis is rejected at conventional levels in all three subsamples, the spatial cluster of Killing Site A is not spatially balanced.

**Results.** Figure 3 depicts the results of the same Fisher’s exact tests for all 514 killing sites. The Fisher’s exact tests are not conducted for 79 sites located in urban areas and 2 sites for which no villages exist within the corresponding spatial clusters. Of the remaining 433 killing sites, 124 have spatially balanced clusters and 309 do not.<sup>24</sup> Of the 124 spatially balanced clusters, 9 do not have the homogeneous distribution of migrant households within the 4.0 km spatial clusters and thus households living within these 9 spatial clusters are excluded from Sample III. As a result, Sample III consists of households living within 115 spatially balanced clusters.<sup>25</sup>

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<sup>24</sup>These 309 killing sites include 54 killing sites for which the Fisher’s exact tests are not done in a complete way because there are no observations in either one or two of the three subsamples. Spatial clusters located away from major roads are more likely to be spatially balanced (column 1 of Appendix Table A11).

<sup>25</sup>The descriptive statistics of household, child, and village characteristics in each sample are reported in Appendix Tables A4 and A5.

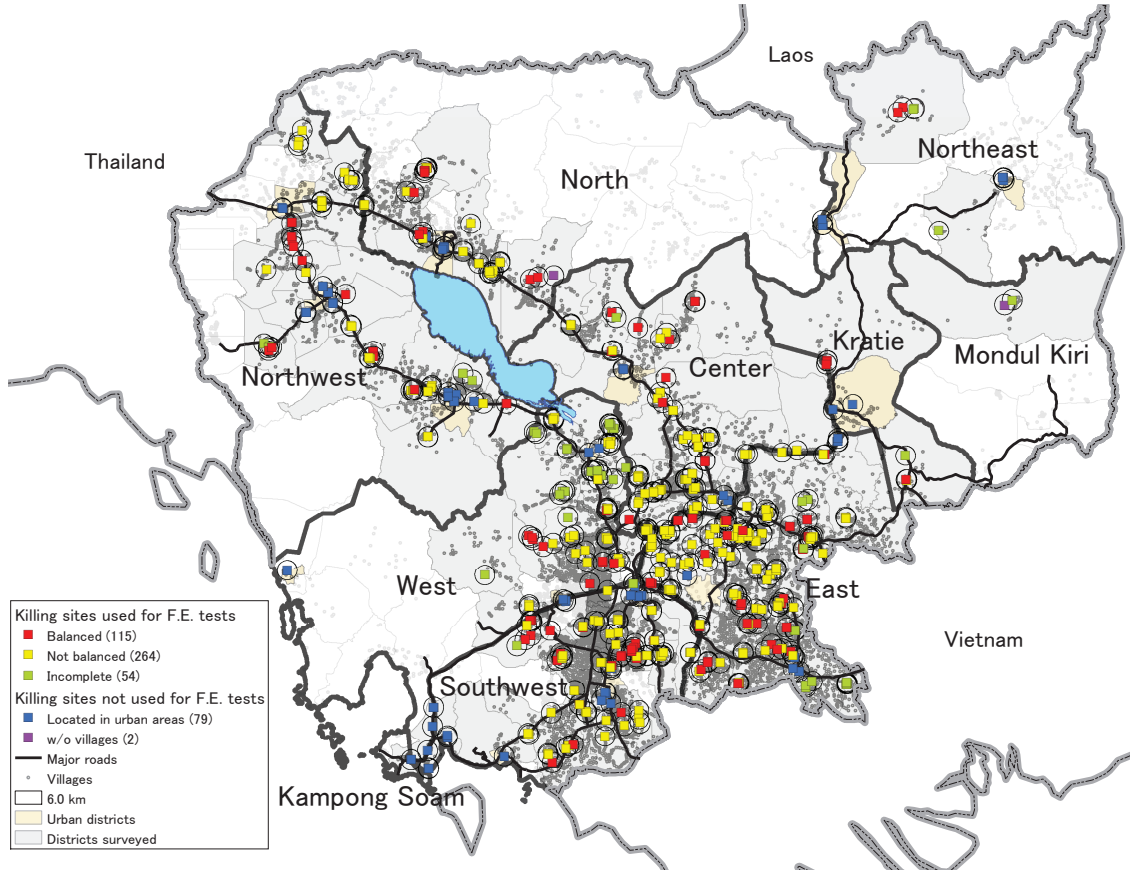


Figure 3: Results of Fisher's Exact Tests

### 4.3 Assessing the Exogeneity

Table 2 shows the relationships of the locations of killing sites with pre-treatment village characteristics (panel A) and parental characteristics (panel B) for each subsample of Samples I, II, and III.<sup>26</sup> The dependent variable is an indicator variable equal to 1 if the points of villages (where couples live) are located within 3.0 km of killing sites and 0 otherwise. This corresponds to our binary genocide measure discussed below. All regressions include zone and district fixed effects. The regressions for Samples II and III additionally include spatial cluster fixed effects. We estimate all regression equations by ordinary least squares (OLS); we also examine the joint significance of the listed variables. The significant relationships between the locations

<sup>26</sup>The corresponding mean comparison is provided in Appendix Tables A13 and A12, respectively.

of killing sites and predetermined variables found in Samples I and II vanish in Sample III. This provides evidence that the locations of killing sites are exogenous within spatially balanced clusters.

## 4.4 Children’s Educational Outcomes

Our analysis evaluates the educational outcomes of children aged 15-21, 15-18, and 15-17 in the 1977-1989, 1980, and 1981-1982 subsamples, respectively, and children aged 6-14 in all these subsamples. In the 1998 Cambodian education system, the former had already finished the nine-year compulsory education, if they received any education, and the latter was still receiving it, if they were receiving any education. Comparing older and younger cohorts enables us to see how the genocide altered parental investments in children’s education over time.

Since all of these children were born during or after the Pol Pot regime, their existence may have been affected by the parents’ exposure to genocidal violence through their fertility decisions.<sup>27</sup> Thus, we use household, not child, as a unit of analysis for household-level outcomes – the proportion or average among children within households.<sup>28</sup>

We consider three outcome measures for each cohort: the proportion having never attended school (*No schooling*), the proportion having completed primary school

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<sup>27</sup>A primary purpose of marriage under the Pol Pot regime with the state ownership of spouses and children was to produce “pure” children who would serve the state and not to form a family unit (Dy (2007, p. 35), Short (2004, p. 325)). Pol Pot wanted to increase, not decrease, the population (Short (2004, p. 321)); anecdotal evidence suggests that couples were pressured by the Khmer Rouge to have a child (Dy (2007, p. 34), Short (2004, p. 322)). Appendix Table A14 examines the difference in the number of children among couples whose first child was born in 1977-1979, 1980, and 1981-1982 for Samples III and IV. The former couples who had their first child earlier have more children and, as expected, the number of children decreases linearly across the three subsamples. This suggests that the three sets of couples had similar fertility behaviors.

<sup>28</sup>Indeed, genocidal violence is positively correlated with the number of children aged 15-18 and aged 15-17 among households whose first child was born in 1980 and 1981-1982, respectively (panel A-5 of Appendix Table A15) and negatively correlated with the number of children aged 6-14, particularly the number of female children aged 6-14, among households whose first child was born in 1981-1982 (panels A-11, A-14, and A-15 of Appendix Table A15). The corresponding child-level analyses (with child as the unit of analysis) yield results consistent with those reported here.

Table 2: Relationships between Locations of Killing Sites and Predetermined Village/Parental Characteristics

| Variable                                                       | Sample I             |                     |                      | Sample II<br>(All spatial clusters) |                      |                     | Sample III<br>(Spatially balanced clusters) |                   |                    |
|----------------------------------------------------------------|----------------------|---------------------|----------------------|-------------------------------------|----------------------|---------------------|---------------------------------------------|-------------------|--------------------|
|                                                                | 1977-79<br>(1)       | 1980<br>(2)         | 1981-82<br>(3)       | 1977-79<br>(4)                      | 1980<br>(5)          | 1981-82<br>(6)      | 1977-79<br>(7)                              | 1980<br>(8)       | 1981-82<br>(9)     |
| A. Village characteristics                                     |                      |                     |                      |                                     |                      |                     |                                             |                   |                    |
| Distance to major roads (km)                                   | -0.004***<br>(0.001) | -0.002<br>(0.001)   | -0.003***<br>(0.001) | 0.001<br>(0.007)                    | 0.001<br>(0.006)     | 0.000<br>(0.005)    | -0.010<br>(0.012)                           | 0.000<br>(0.011)  | -0.003<br>(0.010)  |
| Prop. of non-migrant women<br>aged 36-50 with grade 1-5        | 0.118***<br>(0.034)  | 0.176***<br>(0.034) | 0.074**<br>(0.030)   | 0.041<br>(0.073)                    | 0.207***<br>(0.071)  | 0.014<br>(0.060)    | 0.053<br>(0.117)                            | 0.190<br>(0.116)  | 0.076<br>(0.090)   |
| Prop. of non-migrant women<br>aged 36-50 with grade 6 or above | 0.485***<br>(0.064)  | 0.467***<br>(0.061) | 0.369***<br>(0.054)  | 0.514***<br>(0.115)                 | 0.507***<br>(0.110)  | 0.350***<br>(0.095) | 0.054<br>(0.184)                            | 0.221<br>(0.180)  | 0.150<br>(0.144)   |
| Spatial cluster fixed effects                                  | No                   | No                  | No                   | Yes                                 | Yes                  | Yes                 | Yes                                         | Yes               | Yes                |
| Observations                                                   | 3,989                | 4,154               | 5,197                | 1,979                               | 2,098                | 2,577               | 839                                         | 889               | 1,128              |
| R-squared                                                      | 0.145                | 0.126               | 0.125                | 0.381                               | 0.351                | 0.329               | 0.478                                       | 0.439             | 0.443              |
| p-value of the listed variables                                | 0.000                | 0.000               | 0.000                | 0.000                               | 0.000                | 0.003               | 0.755                                       | 0.285             | 0.575              |
| B. Parental characteristics                                    |                      |                     |                      |                                     |                      |                     |                                             |                   |                    |
| Mother's age                                                   | 0.000<br>(0.002)     | -0.002<br>(0.002)   | -0.001<br>(0.001)    | -0.002<br>(0.002)                   | -0.007***<br>(0.003) | -0.001<br>(0.002)   | 0.000<br>(0.004)                            | -0.003<br>(0.004) | -0.005*<br>(0.003) |
| Father's age                                                   | 0.000<br>(0.001)     | 0.001<br>(0.001)    | 0.000<br>(0.001)     | -0.003*<br>(0.001)                  | 0.003*<br>(0.002)    | 0.000<br>(0.001)    | -0.003<br>(0.002)                           | 0.003<br>(0.003)  | 0.001<br>(0.002)   |
| Mother with grade 1-5                                          | 0.042***<br>(0.010)  | 0.031***<br>(0.010) | 0.020***<br>(0.008)  | 0.025*<br>(0.014)                   | 0.037**<br>(0.014)   | 0.008<br>(0.011)    | 0.034<br>(0.022)                            | 0.033<br>(0.022)  | 0.021<br>(0.016)   |
| Mother with grade 6 or above                                   | 0.065***<br>(0.017)  | 0.039**<br>(0.018)  | 0.052***<br>(0.015)  | 0.058***<br>(0.022)                 | 0.028<br>(0.024)     | 0.052***<br>(0.019) | 0.047<br>(0.035)                            | -0.031<br>(0.035) | -0.005<br>(0.029)  |
| Father with grade 1-5                                          | 0.023**<br>(0.011)   | 0.001<br>(0.011)    | 0.020**<br>(0.008)   | 0.000<br>(0.016)                    | -0.014<br>(0.018)    | 0.013<br>(0.012)    | -0.012<br>(0.027)                           | 0.010<br>(0.029)  | 0.010<br>(0.018)   |
| Father with grade 6 or above                                   | 0.058***<br>(0.013)  | 0.040***<br>(0.014) | 0.059***<br>(0.011)  | 0.018<br>(0.018)                    | 0.029<br>(0.020)     | 0.036**<br>(0.015)  | -0.010<br>(0.028)                           | 0.030<br>(0.031)  | 0.010<br>(0.023)   |
| Spatial cluster fixed effects                                  | No                   | No                  | No                   | Yes                                 | Yes                  | Yes                 | Yes                                         | Yes               | Yes                |
| Observations                                                   | 11,141               | 10,642              | 19,271               | 5,738                               | 5,474                | 9,744               | 2,137                                       | 2,154             | 4,011              |
| R-squared                                                      | 0.149                | 0.128               | 0.134                | 0.407                               | 0.37                 | 0.349               | 0.477                                       | 0.463             | 0.452              |
| p-value of the listed variables                                | 0.000                | 0.000               | 0.000                | 0.003                               | 0.002                | 0.014               | 0.538                                       | 0.280             | 0.319              |
| Num. of killing sites                                          | 435                  | 435                 | 435                  | 433                                 | 433                  | 433                 | 115                                         | 115               | 115                |

*Notes:* The table reports OLS estimates where the unit of observation is the village in panel A and the household in panel B. Robust standard errors are reported in parentheses in panel A and robust standard errors, adjusted for clustering by village, are reported in parentheses in panel B. Sample I – households in the districts surveyed by DC-Cam; Sample II – households within 6.0 km of killing sites; Sample III – households within 6.0 km of the selected killing sites (6.0 km spatially balanced clusters); the dependent variable is an indicator variable equal to 1 if villages are located within 3.0 km of killing sites and 0 otherwise. Zone and district fixed effects are controlled for in all regressions.  $p$ -values are from  $F$ -tests for the joint significance of the listed variables. \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent level.

(*Primary school completion*), and the average years of schooling (*Years of schooling*) for children aged 15-21/18/17 and the proportion having never attended school (*No schooling*), the proportion attending school (*School attendance*), and the average grade progression (*Grade progression*) for children aged 6-14. The grade progression of each child is measured by  $Grade - (Age - 5)$ , which takes 0 if the child progresses from any grade to the next higher one and negative values otherwise. The descriptive statistics of these measures are reported in Appendix Table A4.

Appendix Table A12 compares the outcomes between households living within 3.0 km of killing sites and not within 3.0 km of such sites in each of Samples I, II, and III. In Sample I, households living within 3.0 km of killing sites exhibit better educational outcomes than those living farther away from the sites. Such differences are also found in Sample II, though the differences are smaller than for Sample I. The results reported in Table 2 suggest that these differences are largely associated with the systematic differences in the level of parental education between the two groups. Indeed, most of the significant differences vanish in Sample III with balanced parental education.

## 4.5 Measures of Genocidal Violence

We construct two measures of genocidal violence during the Pol Pot regime: a binary measure (*Genocidal Violence I*) and a continuous measure (*Genocidal Violence II*). The binary measure takes the value of 1 if the points of villages where couples lived are located within 3.0 km of at least one killing site and 0 otherwise. We assume that couples living within 3.0 km of killing sites were exposed to genocidal violence and those living outside were not.

The continuous measure combines the distance from the villages where couples lived to killing sites and the number of victims at the killing sites. We assume that couples were exposed to genocidal violence in all killing sites located within 6.0 km of the villages where they lived (for a robustness check, we also consider 4.0 km and 8.0

km spatial clusters below). In addition, we assume that couples were more severely exposed to genocidal violence if they lived in closer proximity to the killing sites and if more people were executed there.

Specifically, we identify village points located within 6.0 km of each killing site and calculate the distance from the village points to the killing site, then calculate the inverse-distance weighted sum of the numbers of victims (for a robustness check, we also consider the measure based on the second- and third-order polynomial in distance below).<sup>29</sup> We use the logarithmic value of the measure because it has right-skewed distribution (Appendix Figure A1).

The continuous measure incorporating the information for the number of victims is more appropriate than the binary measure with the stronger assumption about the exposure to genocidal violence. Since 184 killing sites lack information about the number of victims (Figure 1), our analysis based on the continuous genocide measure is based on households residing in villages with complete information about victims for all killing sites located within 6.0 km of the villages; households residing in villages lacking victim information for at least one killing site are dropped from Sample III.<sup>30</sup>

We call this limited sample *Sample IV*. The total number of households decreases from 8,302 in Sample III to 3,821 in Sample IV (see Appendix Table A4). Although these two samples have similar household characteristics, Sample IV has slightly worse village characteristics than Sample III (Appendix Table A7), probably because relatively developed villages are located in a greater number of spatial clusters, being

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<sup>29</sup>We do not take into account geographic conditions such as elevation and gradient in constructing the measure of genocidal violence because they are unlikely to differ significantly within small spatial clusters. Cambodia mostly consists of flat and low-lying plains at elevations below 100 meters (Ministry of Rural Development (2009)), and this is especially the case in the central part of the country where most spatial clusters are located (Figure 3). Although rivers can potentially make the local geographic conditions heterogeneous within spatial clusters, our GIS data for rivers are incomplete. Geographically heterogeneous spatial clusters are less likely to be spatially balanced because the level of regional development can vary within the clusters according to geographic conditions.

<sup>30</sup>Some correlations are found between the continuous genocide measure and pre-treatment village/parental characteristics (columns 4-6 of Appendix Table A16).

likely to face the missing data problem. At the same time, compared to Samples I, II, and III, the household and village characteristics of Sample IV are more similar to those of the study population.

## 4.6 Empirical Specifications

This subsection develops empirical specifications only for the binary genocide measure for the sake of brevity; the specifications for the continuous genocide measure are analogous.

We first estimate the following regression equation for Sample I:

$$Y_{ivdz} = \alpha + \gamma GenocidalViolenceI_v + X_i' \beta_1 + X_v' \beta_2 + \pi_d + \lambda_z + \epsilon_{ivdz}, \quad (1)$$

where  $Y_{ivdz}$  is a children's educational outcome of household  $i$  in village  $v$ , district  $d$ , and zone  $z$ ;  $GenocidalViolenceI_v$  is the binary genocide measure, which takes the value 1 if the point of village  $v$  is located within 3.0 km of killing sites and 0 otherwise;  $X_i$  is a vector of pre-treatment parental characteristics (age and education);  $X_v$  is a vector of pre-treatment village characteristics (distance to major roads (km), the education levels of non-migrant women aged 36-50);  $\pi_d$  and  $\lambda_z$  denote district and zone fixed effects, respectively. A parameter of our interest is  $\gamma$ , which captures the impact of the genocide on the outcome.

We then estimate the following regression equation for Samples II and III,

$$Y_{ivbdz} = \alpha + \gamma GenocidalViolenceI_v + X_i' \beta_1 + X_v' \beta_2 + \phi_b + \pi_d + \lambda_z + \epsilon_{ivbdz}, \quad (2)$$

where  $GenocidalViolenceI_v$  is now an indicator variable equal to 1 if the point of village  $v$  is located within 3.0 km of killing sites and 0 if it is located within 3.0-6.0 km of killing sites; the vectors  $X_i$  and  $X_v$  include the same sets of covariates as equation (1);  $\phi_b$  denotes *spatial cluster fixed effects*. This specification exploits variations within spatial clusters as the spatial cluster fixed effects fully control for unobserved cluster-level heterogeneity.<sup>31</sup> The estimated  $\gamma$  based on Sample III provides the most reliable

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<sup>31</sup>Examining potential neighborhood spillover effects is beyond the scope of this paper. We assume



estimate of the impact of the genocide on the children’s educational outcome. We estimate equations (1) and (2) by OLS with robust standard errors clustered by village.<sup>32</sup>

## 5 Empirical Results

### 5.1 Main Results

Table 3 presents the estimated impacts of the genocide on educational outcomes. Although the estimated impacts are mostly positive in Samples I and II, some results become negative in Samples III and IV. This is particularly true for households whose first child was born in 1977-1979. For instance, although the incidence of exposure to genocidal violence among parents (binary measure) increased the years of schooling of children aged 15-21 by 0.136 years in Sample I, it decreased their years of schooling by 0.355 years (7.9% of the mean among those with no exposure) in Sample III (column 7 in panels A-1 vs. A-3); qualitatively the same results hold for the severity of genocidal violence captured by the continuous measure (panel A-4).

These results suggest that the estimates based on Sample I and II suffer from omitted variable bias: Omitted variables, which are positively correlated with the locations of killing sites, may be positively correlated with children’s educational levels, suggesting that the estimates in columns 1-3 and columns 4-10 are biased downward and upward, respectively.

The adverse impacts in Samples III and IV are found for children aged both 15-21

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constant spillover effects, if any, around killing sites, which are controlled for by spatial cluster fixed effects.

<sup>32</sup>The clustering at the level of spatial cluster for conservative inference is not feasible because many villages fall within more than one spatial cluster (as depicted in Figure 2). Since the administrative unit above village, commune, was determined after the Pol Pot regime, commune-level clustering is not adequate. When we used the administrative unit above commune, district, for clustering, most estimation results except for some for the binary violence measure reported below are statistically significant at conventional levels, despite the small number of districts covered in Sample III and IV within spatially balanced clusters (66 and 51 districts, respectively). The results are available from the authors upon request.

Table 3: Impacts of Genocide on Children's Educational Outcomes

| Subsample:                         | 1977-79                                       | 1980                | 1981-82            | 1977-79                   | 1980               | 1981-82             | 1977-79                | 1980               | 1981-82             |
|------------------------------------|-----------------------------------------------|---------------------|--------------------|---------------------------|--------------------|---------------------|------------------------|--------------------|---------------------|
|                                    | (1)                                           | (2)                 | (3)                | (4)                       | (5)                | (6)                 | (7)                    | (8)                | (9)                 |
| Cohort:                            | A. Children aged 15-21/18/17                  |                     |                    |                           |                    |                     |                        |                    |                     |
| Dependent variable:                | No schooling                                  |                     |                    | Primary school completion |                    |                     | Years of schooling     |                    |                     |
|                                    | A-1. Sample I                                 |                     |                    |                           |                    |                     |                        |                    |                     |
| Genocidal Violence I               | -0.005<br>(0.008)                             | -0.002<br>(0.008)   | -0.009<br>(0.007)  | 0.027***<br>(0.010)       | 0.018<br>(0.011)   | 0.050***<br>(0.009) | 0.136**<br>(0.062)     | 0.119*<br>(0.068)  | 0.269***<br>(0.056) |
| Mean ( $\geq 3.0$ km)              | 0.231                                         | 0.212               | 0.214              | 0.299                     | 0.330              | 0.308               | 4.038                  | 4.218              | 4.075               |
| Observations                       | 11,141                                        | 10,642              | 19,271             | 11,141                    | 10,642             | 19,271              | 11,141                 | 10,642             | 19,271              |
| Observations ( $< 3.0$ km of K.S.) | 2,886                                         | 2,602               | 4,654              | 2,886                     | 2,602              | 4,654               | 2,886                  | 2,602              | 4,654               |
| R-squared                          | 0.291                                         | 0.262               | 0.219              | 0.229                     | 0.210              | 0.172               | 0.357                  | 0.325              | 0.299               |
|                                    | A-2. Sample II (all spatial clusters)         |                     |                    |                           |                    |                     |                        |                    |                     |
| Genocidal Violence I               | 0.011<br>(0.011)                              | 0.011<br>(0.011)    | -0.010<br>(0.009)  | 0.016<br>(0.014)          | 0.002<br>(0.014)   | 0.041***<br>(0.012) | 0.029<br>(0.085)       | -0.013<br>(0.089)  | 0.192***<br>(0.070) |
| Mean ( $\geq 3.0$ km)              | 0.192                                         | 0.177               | 0.172              | 0.329                     | 0.362              | 0.341               | 4.343                  | 4.527              | 4.403               |
| Observations                       | 5,738                                         | 5,474               | 9,744              | 5,738                     | 5,474              | 9,744               | 5,738                  | 5,474              | 9,744               |
| Observations ( $< 3.0$ km of K.S.) | 2,632                                         | 2,398               | 4,316              | 2,632                     | 2,398              | 4,316               | 2,632                  | 2,398              | 4,316               |
| R-squared                          | 0.341                                         | 0.292               | 0.236              | 0.277                     | 0.268              | 0.217               | 0.395                  | 0.360              | 0.327               |
|                                    | A-3. Sample III (spatially balanced clusters) |                     |                    |                           |                    |                     |                        |                    |                     |
| Genocidal Violence I               | 0.033*<br>(0.019)                             | -0.004<br>(0.021)   | -0.002<br>(0.015)  | -0.026<br>(0.023)         | -0.020<br>(0.025)  | 0.005<br>(0.019)    | -0.355**<br>(0.146)    | -0.191<br>(0.158)  | -0.018<br>(0.118)   |
| Mean ( $\geq 3.0$ km)              | 0.19                                          | 0.184               | 0.17               | 0.355                     | 0.375              | 0.353               | 4.515                  | 4.61               | 4.530               |
| Observations                       | 2,137                                         | 2,154               | 4,011              | 2,137                     | 2,154              | 4,011               | 2,137                  | 2,154              | 4,011               |
| Observations ( $< 3.0$ km of K.S.) | 965                                           | 945                 | 1,764              | 965                       | 945                | 1,764               | 965                    | 945                | 1,764               |
| R-squared                          | 0.394                                         | 0.354               | 0.271              | 0.333                     | 0.318              | 0.237               | 0.454                  | 0.401              | 0.350               |
|                                    | A-4. Sample IV (spatially balanced clusters)  |                     |                    |                           |                    |                     |                        |                    |                     |
| ln (Genocidal Violence II)         | 0.0432**<br>(0.0205)                          | -0.0078<br>(0.0186) | 0.0119<br>(0.0150) | -0.0403**<br>(0.0170)     | 0.0086<br>(0.0234) | 0.0101<br>(0.0209)  | -0.3720***<br>(0.1264) | 0.0348<br>(0.1428) | 0.0264<br>(0.1133)  |
| Mean of the outcome ( $< 6.0$ km)  | 0.231                                         | 0.222               | 0.200              | 0.317                     | 0.319              | 0.307               | 4.176                  | 4.177              | 4.171               |
| Mean of ln (Genocidal Violence II) | 6.022                                         | 5.864               | 5.651              | 6.022                     | 5.864              | 5.651               | 6.022                  | 5.864              | 5.651               |
| S.D. of ln (Genocidal Violence II) | 1.736                                         | 1.742               | 1.707              | 1.736                     | 1.742              | 1.707               | 1.736                  | 1.742              | 1.707               |
| Observations                       | 1,008                                         | 1,015               | 1,798              | 1,008                     | 1,015              | 1,798               | 1,008                  | 1,015              | 1,798               |
| R-squared                          | 0.374                                         | 0.322               | 0.272              | 0.307                     | 0.264              | 0.209               | 0.440                  | 0.362              | 0.335               |
|                                    | Continue                                      |                     |                    |                           |                    |                     |                        |                    |                     |

*Continue*

Table 3: Impacts of Genocide on Children's Educational Outcomes

| Subsample:                         | 1977-79                                       | 1980                | 1981-82             | 1977-79               | 1980               | 1981-82             | 1977-79               | 1980                | 1981-82            | 1977-79 | 1980 | 1981-82 |
|------------------------------------|-----------------------------------------------|---------------------|---------------------|-----------------------|--------------------|---------------------|-----------------------|---------------------|--------------------|---------|------|---------|
|                                    | (1)                                           | (2)                 | (3)                 | (4)                   | (5)                | (6)                 | (7)                   | (8)                 | (9)                | (10)    | (11) | (12)    |
|                                    | B. Children aged 6-14                         |                     |                     |                       |                    |                     |                       |                     |                    |         |      |         |
| Dependent variable:                | No schooling                                  |                     |                     |                       |                    |                     | School attendance     |                     |                    |         |      |         |
|                                    |                                               |                     |                     |                       |                    |                     | Grade progression     |                     |                    |         |      |         |
| Genocidal Violence I               | -0.005<br>(0.009)                             | -0.003<br>(0.009)   | -0.015**<br>(0.007) | 0.006<br>(0.010)      | 0.003<br>(0.009)   | 0.016**<br>(0.008)  | -0.008<br>(0.035)     | 0.000<br>(0.036)    | 0.057**<br>(0.028) |         |      |         |
| Mean ( $\geq 3.0$ km)              | 0.366                                         | 0.349               | 0.360               | 0.618                 | 0.635              | 0.622               | -3.712                | -3.656              | -3.637             |         |      |         |
| Observations                       | 10,520                                        | 10,185              | 18,661              | 10,520                | 10,185             | 18,661              | 10,520                | 10,185              | 18,661             |         |      |         |
| Observations ( $< 3.0$ km of K.S.) | 2,697                                         | 2,490               | 4,476               | 2,697                 | 2,490              | 4,476               | 2,697                 | 2,490               | 4,476              |         |      |         |
| R-squared                          | 0.233                                         | 0.225               | 0.224               | 0.222                 | 0.217              | 0.214               | 0.150                 | 0.155               | 0.160              |         |      |         |
|                                    | B-2. Sample II (all spatial clusters)         |                     |                     |                       |                    |                     |                       |                     |                    |         |      |         |
| Genocidal Violence I               | 0.001<br>(0.013)                              | 0.016<br>(0.012)    | -0.002<br>(0.009)   | 0.002<br>(0.013)      | -0.016<br>(0.012)  | 0.006<br>(0.009)    | -0.041<br>(0.049)     | 0.000<br>(0.047)    | -0.011<br>(0.034)  |         |      |         |
| Mean ( $\geq 3.0$ km)              | 0.323                                         | 0.312               | 0.315               | 0.659                 | 0.672              | 0.667               | -3.588                | -3.554              | -3.488             |         |      |         |
| Observations                       | 5,402                                         | 5,246               | 9,416               | 5,402                 | 5,246              | 9,416               | 5,402                 | 5,246               | 9,416              |         |      |         |
| Observations ( $< 3.0$ km of K.S.) | 2,460                                         | 2,294               | 4,149               | 2,460                 | 2,294              | 4,149               | 2,460                 | 2,294               | 4,149              |         |      |         |
| R-squared                          | 0.283                                         | 0.271               | 0.269               | 0.271                 | 0.262              | 0.260               | 0.218                 | 0.209               | 0.208              |         |      |         |
|                                    | B-3. Sample III (spatially balanced clusters) |                     |                     |                       |                    |                     |                       |                     |                    |         |      |         |
| Genocidal Violence I               | 0.031<br>(0.021)                              | 0.040*<br>(0.022)   | -0.006<br>(0.014)   | -0.032<br>(0.022)     | -0.040*<br>(0.022) | 0.015<br>(0.015)    | -0.148*<br>(0.088)    | -0.003<br>(0.073)   | 0.027<br>(0.054)   |         |      |         |
| Mean ( $\geq 3.0$ km)              | 0.314                                         | 0.306               | 0.305               | 0.665                 | 0.677              | 0.676               | -3.547                | -3.565              | -3.441             |         |      |         |
| Observations                       | 2,027                                         | 2,068               | 3,900               | 2,027                 | 2,068              | 3,900               | 2,027                 | 2,068               | 3,900              |         |      |         |
| Observations ( $< 3.0$ km of K.S.) | 908                                           | 909                 | 1,705               | 908                   | 909                | 1,705               | 908                   | 909                 | 1,705              |         |      |         |
| R-squared                          | 0.349                                         | 0.322               | 0.310               | 0.340                 | 0.308              | 0.298               | 0.283                 | 0.265               | 0.236              |         |      |         |
|                                    | B-4. Sample IV (spatially balanced clusters)  |                     |                     |                       |                    |                     |                       |                     |                    |         |      |         |
| ln (Genocidal Violence II)         | 0.0543**<br>(0.0210)                          | -0.0012<br>(0.0208) | 0.0165<br>(0.0144)  | -0.0538**<br>(0.0218) | 0.0094<br>(0.0213) | -0.0159<br>(0.0148) | -0.1855**<br>(0.0810) | -0.0060<br>(0.0724) | 0.0537<br>(0.0516) |         |      |         |
| Mean of the outcome ( $< 6.0$ km)  | 0.342                                         | 0.346               | 0.333               | 0.637                 | 0.637              | 0.647               | -3.669                | -3.623              | -3.548             |         |      |         |
| Mean of ln (Genocidal Violence II) | 6.018                                         | 5.864               | 5.647               | 6.018                 | 5.864              | 5.647               | 6.018                 | 5.864               | 5.647              |         |      |         |
| S.D. of ln (Genocidal Violence II) | 1.740                                         | 1.749               | 1.710               | 1.740                 | 1.749              | 1.710               | 1.740                 | 1.749               | 1.710              |         |      |         |
| Observations                       | 951                                           | 974                 | 1,752               | 951                   | 974                | 1,752               | 951                   | 974                 | 1,752              |         |      |         |
| R-squared                          | 0.352                                         | 0.306               | 0.299               | 0.352                 | 0.294              | 0.287               | 0.234                 | 0.232               | 0.229              |         |      |         |

Notes: The table reports OLS estimates where the unit of observation is the household. Robust standard errors, adjusted for clustering by village, are reported in parentheses. Sample I – households in the districts surveyed by DC-Cam; Sample II – households within 6.0 km of killing sites; Sample III – households within 6.0 km of the selected killing sites (6.0 km spatially balanced clusters); Sample IV – households within 6.0 km of the selected killing sites with victim information (6.0 km spatially balanced clusters). “No schooling” is the proportion of children aged 15-21/18/17 (6-14) who have never attended school. “Primary school completion” is the proportion of children aged 15-21/18/17 who have completed primary school. “Years of schooling” is the average years of schooling of children aged 15-21/18/17. “School attendance” is the proportion of children aged 6-14 who attended school at the time of the 1998 Census. “Grade progression” is the average grade progression of children aged 6-14 measured by Grade - (Age - 5). “Genocidal Violence I” is the binary genocide measure, which takes the value of 1 if households live within 3.0 km of killing sites and 0 otherwise. “ln (Genocidal Violence II)” is the logarithmic value of the inverse distance (km) weighted sum of the number of victims at the killing sites located within 6.0 km of the points of the villages where couples live. In all regressions, the following variables are controlled: mother's age, father's age, a set of dummy variables for mothers' and fathers' educational attainment (grade 1-5 and grade 6 or above), three variables on village characteristics (the distance to major roads (km)), the proportion of non-migrant women aged 36-50 with grade 1-5, and the proportion of non-migrant women aged 36-50 with grade 6 or above), zone and district fixed effects, and spatial cluster fixed effects (only in panels A-2, A-3, A-4, B-2, B-3, and B-4). \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent level.

and 6-14; for instance, a one standard deviation increase in the continuous genocide measure (28.8% and 28.9% increase for children aged 15-21 and 6-14, respectively) is associated with a 1.162 percentage point decrease in the primary school completion rate of children aged 15-21 and a 1.556 percentage point decrease in the school attendance rate of children aged 6-14, respectively (column 4 of panels A-4 and B-4).<sup>33</sup> This suggests that the genocide had lasting adverse impacts on the parental investments in children’s education.

## 5.2 Mechanisms

We add post-treatment household characteristics (parental occupation, housing conditions, and family structure) and village characteristics (village population and education infrastructure) as additional covariates to equation (2). While these variables may be influenced by genocidal violence, they may also alter the children’s educational outcomes (Appendix Table A15 reports the estimated impacts of the genocide measures on some of these post-treatment variables). Our aim is not to estimate the causal effects of the genocide on the outcomes, but to estimate the “net treatment differences” defined by Rosenbaum (1984) by simply adjusting for the observed values of the post-treatment variables. Although this parameter generally lacks causal interpretation, it provides insights into the mechanism underlying the impacts of the genocide on parental behaviors.

The estimation results are reported in Table 4. We consider four specifications in a sequential manner (*Specifications I, II, III, and IV*).<sup>34</sup>

- (1) Specification I adds controls for the composition of children aged 15-21/18/17 (panel A) and 6-14 (panel B): a set of dummy variables for having a child of

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<sup>33</sup>The estimated impacts are small in magnitude because, distinct from the binary genocide measure, these estimates capture the relative difference among couples with different levels of exposure to the genocide within spatial clusters, assuming that all couples within spatial clusters were exposed to genocidal violence.

<sup>34</sup>The descriptive statistics of the post-treatment variables controlled for in each specification are available from the authors upon request.

Table 4: Genocide Impacts Adjusted for Post-treatment Characteristics

| Subsample:             | 1977-79                                                                  | 1980                | 1981-82            | 1977-79                   | 1980               | 1981-82            | 1977-79                | 1980                | 1981-82            |
|------------------------|--------------------------------------------------------------------------|---------------------|--------------------|---------------------------|--------------------|--------------------|------------------------|---------------------|--------------------|
|                        | (1)                                                                      | (2)                 | (3)                | (4)                       | (5)                | (6)                | (7)                    | (8)                 | (9)                |
| Cohort:                | A. Children aged 15-21/18/17                                             |                     |                    |                           |                    |                    |                        |                     |                    |
| Dependent variable:    | No schooling                                                             |                     |                    | Primary school completion |                    |                    | Years of schooling     |                     |                    |
|                        | A-1. Sample III (spatially balanced clusters): Genocidal Violence I      |                     |                    |                           |                    |                    |                        |                     |                    |
| Baseline specification | 0.033*<br>(0.019)                                                        | -0.004<br>(0.021)   | -0.002<br>(0.015)  | -0.026<br>(0.023)         | -0.020<br>(0.025)  | 0.005<br>(0.019)   | -0.355**<br>(0.146)    | -0.191<br>(0.158)   | -0.018<br>(0.118)  |
| Specification I        | 0.033*<br>(0.018)                                                        | -0.002<br>(0.021)   | -0.001<br>(0.015)  | -0.023<br>(0.023)         | -0.022<br>(0.024)  | 0.005<br>(0.018)   | -0.339**<br>(0.142)    | -0.211<br>(0.157)   | -0.018<br>(0.115)  |
| Specification II       | 0.034*<br>(0.019)                                                        | -0.002<br>(0.021)   | -0.002<br>(0.015)  | -0.028<br>(0.023)         | -0.027<br>(0.024)  | 0.005<br>(0.018)   | -0.370***<br>(0.138)   | -0.238<br>(0.152)   | -0.027<br>(0.108)  |
| Specification III      | 0.038**<br>(0.019)                                                       | -0.002<br>(0.021)   | -0.002<br>(0.015)  | -0.032<br>(0.022)         | -0.022<br>(0.024)  | 0.006<br>(0.017)   | -0.394***<br>(0.137)   | -0.213<br>(0.151)   | -0.027<br>(0.107)  |
| Specification IV       | 0.042**<br>(0.019)                                                       | 0.003<br>(0.021)    | -0.001<br>(0.015)  | -0.041*<br>(0.023)        | -0.027<br>(0.024)  | 0.001<br>(0.018)   | -0.453***<br>(0.140)   | -0.256*<br>(0.152)  | -0.051<br>(0.109)  |
| Observations           | 2,137                                                                    | 2,154               | 4,011              | 2,137                     | 2,154              | 4,011              | 2,137                  | 2,154               | 4,011              |
|                        | A-2. Sample IV (spatially balanced clusters): ln (Genocidal Violence II) |                     |                    |                           |                    |                    |                        |                     |                    |
| Baseline specification | 0.0432**<br>(0.0205)                                                     | -0.0078<br>(0.0186) | 0.0119<br>(0.0150) | -0.0403**<br>(0.0170)     | 0.0086<br>(0.0234) | 0.0101<br>(0.0209) | -0.3720***<br>(0.1264) | 0.0348<br>(0.1428)  | 0.0264<br>(0.1133) |
| Specification I        | 0.0425**<br>(0.0208)                                                     | -0.0071<br>(0.0180) | 0.0131<br>(0.0148) | -0.0402**<br>(0.0172)     | 0.0083<br>(0.0219) | 0.0078<br>(0.0210) | -0.3748***<br>(0.1247) | 0.0301<br>(0.1328)  | 0.0077<br>(0.1116) |
| Specification II       | 0.0427**<br>(0.0211)                                                     | -0.0061<br>(0.0180) | 0.0115<br>(0.0150) | -0.0432**<br>(0.0170)     | 0.0114<br>(0.0210) | 0.0097<br>(0.0206) | -0.3880***<br>(0.1251) | 0.0363<br>(0.1271)  | 0.0199<br>(0.1093) |
| Specification III      | 0.0417*<br>(0.0218)                                                      | -0.0032<br>(0.0181) | 0.0132<br>(0.0155) | -0.0424***<br>(0.0160)    | 0.0077<br>(0.0207) | 0.0128<br>(0.0210) | -0.3868***<br>(0.1224) | 0.0135<br>(0.1283)  | 0.0331<br>(0.1114) |
| Specification IV       | 0.0421*<br>(0.0223)                                                      | -0.0011<br>(0.0181) | 0.0093<br>(0.0163) | -0.0454***<br>(0.0171)    | 0.0053<br>(0.0208) | 0.0099<br>(0.0205) | -0.4063***<br>(0.1327) | -0.0086<br>(0.1296) | 0.0357<br>(0.1127) |
| Observations           | 1,008                                                                    | 1,015               | 1,798              | 1,008                     | 1,015              | 1,798              | 1,008                  | 1,015               | 1,798              |

*Continue*

Table 4: Genocide Impacts Adjusted for Post-treatment Characteristics

| Subsample:             | 1977-79<br>(1)                                                           | 1980<br>(2)         | 1981-82<br>(3)     | 1977-79<br>(4)         | 1980<br>(5)         | 1981-82<br>(6)      | 1977-79<br>(7)         | 1980<br>(8)         | 1981-82<br>(9)      |
|------------------------|--------------------------------------------------------------------------|---------------------|--------------------|------------------------|---------------------|---------------------|------------------------|---------------------|---------------------|
| Cohort:                | B. Children aged 6-14                                                    |                     |                    |                        |                     |                     |                        |                     |                     |
| Dependent variable:    | No schooling                                                             |                     |                    | School attendance      |                     |                     | Grade progression      |                     |                     |
|                        | B-1. Sample III (spatially balanced clusters): Genocidal Violence I      |                     |                    |                        |                     |                     |                        |                     |                     |
| Baseline specification | 0.031<br>(0.021)                                                         | 0.040*<br>(0.022)   | -0.006<br>(0.014)  | -0.032<br>(0.022)      | -0.040*<br>(0.022)  | 0.015<br>(0.015)    | -0.148*<br>(0.088)     | -0.003<br>(0.073)   | 0.027<br>(0.054)    |
| Specification I        | 0.035*<br>(0.021)                                                        | 0.034<br>(0.021)    | -0.004<br>(0.014)  | -0.035*<br>(0.021)     | -0.033<br>(0.021)   | 0.012<br>(0.014)    | -0.115<br>(0.078)      | -0.078<br>(0.067)   | -0.010<br>(0.048)   |
| Specification II       | 0.037*<br>(0.021)                                                        | 0.035*<br>(0.021)   | -0.004<br>(0.014)  | -0.037*<br>(0.021)     | -0.035*<br>(0.021)  | 0.012<br>(0.014)    | -0.131*<br>(0.076)     | -0.086<br>(0.066)   | -0.015<br>(0.046)   |
| Specification III      | 0.042**<br>(0.021)                                                       | 0.034<br>(0.021)    | -0.004<br>(0.014)  | -0.042*<br>(0.022)     | -0.034*<br>(0.021)  | 0.013<br>(0.014)    | -0.154**<br>(0.076)    | -0.077<br>(0.066)   | -0.014<br>(0.046)   |
| Specification IV       | 0.045**<br>(0.021)                                                       | 0.038*<br>(0.020)   | -0.006<br>(0.014)  | -0.045**<br>(0.022)    | -0.038*<br>(0.020)  | 0.014<br>(0.014)    | -0.189**<br>(0.076)    | -0.088<br>(0.064)   | -0.026<br>(0.047)   |
| Observations           | 2,027                                                                    | 2,068               | 3,900              | 2,027                  | 2,068               | 3,900               | 2,027                  | 2,068               | 3,900               |
|                        | B-2. Sample IV (spatially balanced clusters): ln (Genocidal Violence II) |                     |                    |                        |                     |                     |                        |                     |                     |
| Baseline specification | 0.0543**<br>(0.0210)                                                     | -0.0012<br>(0.0208) | 0.0165<br>(0.0144) | -0.0538**<br>(0.0218)  | 0.0094<br>(0.0213)  | -0.0159<br>(0.0148) | -0.1855**<br>(0.0810)  | -0.0060<br>(0.0724) | 0.0537<br>(0.0516)  |
| Specification I        | 0.0581***<br>(0.0209)                                                    | 0.0049<br>(0.0199)  | 0.0146<br>(0.0142) | -0.0580***<br>(0.0215) | 0.0032<br>(0.0203)  | -0.0145<br>(0.0145) | -0.2018***<br>(0.0711) | 0.0146<br>(0.0719)  | -0.0102<br>(0.0464) |
| Specification II       | 0.0613***<br>(0.0214)                                                    | 0.0058<br>(0.0200)  | 0.0133<br>(0.0144) | -0.0608***<br>(0.0220) | 0.0021<br>(0.0204)  | -0.0134<br>(0.0146) | -0.2194***<br>(0.0703) | 0.0130<br>(0.0715)  | -0.0081<br>(0.0464) |
| Specification III      | 0.0666***<br>(0.0220)                                                    | 0.0100<br>(0.0199)  | 0.0126<br>(0.0141) | -0.0666***<br>(0.0225) | -0.0013<br>(0.0205) | -0.0132<br>(0.0144) | -0.2292***<br>(0.0713) | 0.0098<br>(0.0717)  | -0.0040<br>(0.0457) |
| Specification IV       | 0.0709***<br>(0.0225)                                                    | 0.0137<br>(0.0186)  | 0.0105<br>(0.0137) | -0.0707***<br>(0.0230) | -0.0044<br>(0.0186) | -0.0110<br>(0.0142) | -0.2462***<br>(0.0758) | -0.0113<br>(0.0723) | -0.0144<br>(0.0435) |
| Observations           | 951                                                                      | 974                 | 1,752              | 951                    | 974                 | 1,752               | 951                    | 974                 | 1,752               |

*Notes:* The table reports OLS estimates where the unit of observation is the household. Robust standard errors, adjusted for clustering by village, are reported in parentheses. See the notes to Table 3 for the samples, the dependent variables, the genocide measures, and the variables included in the baseline specification. In Specifications I-IV, the following variables are additionally controlled: Specification I – a set of dummy variables on the composition of children and female children aged 15-21/18/17 (panel A) and 6-14 (panel B); Specification II – a dummy variable for female-headed households, two dummy variables for mother and father working in a non-farm sector, and a set of dummy variables for better housing (light, fuel, water, and toilet) conditions; Specification III – a set of dummy variables on the composition of children and female children aged 6-14 (panel A) and 15-21/18/17 (panel B), two dummy variables for having grandmother and grandfather, and a dummy variable for having children aged younger than 6 years; Specification IV – a dummy variable for having a child who died, the logarithmic value of the village population, two dummy variables for having primary and secondary schools in the village, and two continuous variables of the distance (km) to the nearest primary and secondary schools. \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent level.

each age and a female child of each age.

- (2) Specification II further adds controls for female-headed households (dummy), parental occupation (two dummy variables for mother and father working in a non-farm sector), and housing conditions (a set of dummy variables for better housing (light, fuel, water, toilet) conditions)<sup>35</sup> to control for household income.
- (3) Specification III adds additional controls for demographic composition: a set of dummy variables for the composition of children and female children aged 6-14 (panel A) and 15-21/18/17 (panel B), two dummy variables for having grandmother and grandfather, and a dummy variable for having children aged younger than 6 years.
- (4) Specification IV further adds controls for child death<sup>36</sup> and village characteristics: a dummy variable for having a child who died, the logarithm of village population, two dummy variables for primary and secondary schools available in the village, and two continuous variables of distance (km) to the nearest primary and secondary schools.

The adverse impacts of the genocide shown in Table 3 mostly grow somewhat stronger after adjusting for the post-treatment variables, which suggests that these adverse impacts are not driven by their potential effects on post-treatment variables, such as school-supply factors.<sup>37</sup>

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<sup>35</sup>See the notes to Appendix Table A15 for more detailed information on the variables of housing conditions.

<sup>36</sup>Repeating the analyses focusing on couples without a child death yields results consistent with those reported here. The results are available from the authors upon request.

<sup>37</sup>The adverse genocide impacts might be partly driven by supply-side factors such as limited access to schools because schools were often used as prisons and execution sites under the Pol Pot regime and the reconstruction of schools after its collapse might have been delayed around killing sites. Although we find some evidence that villages around killing sites are less likely to have a primary school (panel B-2 of Appendix Table A15), we also find strong evidence that children living in villages around killing sites have better access to secondary schools (panel B-5 of Appendix Table A15).

### 5.3 Robustness checks

This subsection conducts a series of robustness checks.

**Alternative Samples.** We first examine the robustness of our results to alternative samples. Specifically, we consider three different samples (*Samples III-A, III-B, and III-C*) (see Appendix Table A17). These three samples are constructed based on the Fisher’s exact tests for three different samples (*FET Samples III-A, III-B, and III-C*) (see Appendix Table A9). FET Sample III-A is selected under the same conditions as our study population.<sup>38</sup> FET Samples III-B and III-C are two extreme samples selected by imposing all or no conditions, respectively, listed in Appendix Table A9.<sup>39</sup>

Killing-site locations are mostly non-significantly correlated with pre-treatment village and parental characteristics in Samples III-B and III-C (Appendix Table A10).<sup>40</sup> Although some correlations are found in Sample III-A, they are not strong relative to those found in Samples I and II. The estimated genocide impacts are largely consistent with those based on Samples III and IV, though there is some difference in the magnitude of estimated coefficients and statistical significance levels (see Appendix Table A17).<sup>41</sup>

**Alternative Size of Spatial Clusters.** We next examine how robust our results

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<sup>38</sup>In addition to condition 16 (migrant status) given in Appendix Table A3, we do not impose conditions 8-10; Sample III is also obtained from the sample selected in the same manner (*FET Sample III*) (see Appendix Table A8). This is because these conditions to reduce unobserved factors that may be correlated with outcomes (conditions 8-10) and to assume parental education as pre-treatment characteristics (conditions 8 and 9) for econometric analysis are not needed for Fisher’s exact tests (though since the number of observations excluded by imposing these three conditions is small, this difference in imposed conditions should not affect our main results). We perform the same procedures to obtain the three study samples (*Samples III-A, III-B, and III-C*) as those to obtain Sample III described in Section 4.2.

<sup>39</sup>Fisher’s exact tests are conducted for the whole FET Sample III-C because with no condition imposed on the age of the first child the subsamples defined by the age of first child are irrelevant.

<sup>40</sup>The sample size is relatively small in Sample III-C because the number of spatially balanced clusters is small.

<sup>41</sup>Appendix Table A17 reports estimates for equation (2) with only pre-treatment variables controlled for (*Baseline specification*) and the specification with a full set of post-treatment variables (*Specification IV*).



are to the size of spatial clusters by considering 4.0 km and 8.0 km spatial clusters.<sup>42</sup> Compared to the original 6.0 km spatial clusters, the number of spatially balanced clusters is greater (smaller) and the number of observations within each spatial cluster is smaller (greater) for the 4.0 km (8.0 km) spatial clusters; thus, a trade-off exists between omitted variable bias and statistical power in these two alternative spatial clusters. The estimation results are largely consistent with the original results based on the 6.0 km spatial clusters (see Appendix Tables A18 and A19).<sup>43</sup>

**Alternative Genocide Measures.** We next consider the robustness of our results to alternative continuous genocide measures – second- and third-order polynomial in distance (see Appendix Figure A1 for the distribution of the alternative measures). With a higher order polynomial in distance, the weights for couples living in distant villages decrease more rapidly. The estimation results for our main samples based on the 6.0 km spatial clusters are largely consistent with the original results (see Appendix Table A21).

**Sample Selection Problem.** Our final robustness check addresses potential selection bias in our analysis of survivors. Under the Pol Pot regime, intellectuals were targeted for execution, and many of them were executed (e.g., Kiernan (2008)). Since our data include only survivors of the Pol Pot era, if intellectuals who lived near killing sites were more likely to be executed during the Pol Pot regime, our estimates in Tables 3 and 4 may be biased upward in columns 1-3 and downward in columns 4-10.

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<sup>42</sup>We follow the same procedures described in Section 4.2 in selecting spatially balanced clusters for 4.0 km and 8.0 km spatial clusters to conduct Fisher’s exact tests. We consider various samples for Fisher’s exact tests with different definitions of the proportion of migrants to attain a better balance. Although the sample for 4.0 km spatial clusters is selected under the same conditions as that for 6.0 km spatial clusters (Appendix Table A8), the sample for 8.0 km spatial clusters is selected without imposing the conditions that the type of family is nuclear and all children speak Khmer (Cambodian) and believe in Buddhism (i.e., conditions 12-14 in Appendix Table A8).

<sup>43</sup>In the study samples based on the 4.0 km and 8.0 km spatial clusters, some correlations are found between the binary genocide measure and pre-treatment village/parental characteristics (Appendix Table A20) and between the continuous genocide measure and pre-treatment village/parental characteristics (columns 1-3 and columns 7-9 of Appendix Table A16).

To address this potential problem, we repeat the analyses for couples who completed grade 0-5.<sup>44</sup> Since those who had more than basic primary education (i.e., grade 6) were considered intellectuals under the Pol Pot regime (Vickery (1999, p. 39)), those couples are likely to have been treated as non-intellectuals. The estimation results for our main samples based on the 6.0 km spatial clusters are largely consistent with the original results (see Appendix Table A22).

## 5.4 Heterogeneity

Given the robustness of our base results, we now examine heterogeneity in the genocide impacts among different groups, the results of which help us understand underlying mechanisms discussed in the next section.

**Gender Differences.** We first repeat the analyses for households with at least one male or female child aged 15-21/18/17 and 6-14 (see Appendix Table A23).<sup>45</sup> The adverse impacts of the genocide on children’s educational outcomes are stronger for males than females.

**First Child.** We next repeat the analyses focusing on outcome measures of the first child of couples (see Appendix Table A24).<sup>46</sup> Compared to the original results, the adverse impacts of the genocide on the first child are somewhat stronger.

**Five Subsamples.** Last, we examine heterogeneity in the genocide impacts among couples whose first child was born in 1977-1978, 1979, 1981, and 1982 separately, as well as 1980 (see Appendix Table A25).<sup>47</sup> The adverse impacts of the

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<sup>44</sup>We examine the relationships between killing-site locations and widows for households in which either the mother or father has or both have never migrated outside his/her or their villages of birth, finding no significant relationships (see panel A-3 of Appendix Table A15).

<sup>45</sup>As a caution, having female children aged 6-14 is somewhat correlated with couples’ exposure to genocidal violence (see panel A-14 of Appendix Table A15).

<sup>46</sup>Focusing on outcome measures of children other than the first child gives rise to unstable results (especially in the 1981-1982 subsample) because we need to restrict the sample to households with more than one child.

<sup>47</sup>Conducting Fisher’s exact tests for the 1977-1978, 1979, 1981, and 1982 subsamples is not feasible because of the small number of spatially balanced clusters. We simply divide Samples III and IV into the five subsamples for the analyses. For the same reason, we do not examine heterogeneity among couples whose first child was born in 1977 or 1978.

genocide are generally stronger among couples whose first child was born in 1977-1978 than those whose first child was born afterward.

## 6 Discussion

This section discusses plausible underlying mechanisms behind the empirical findings. First, the genocide under the Khmer Rouge's rule should have triggered *the emotion of fear* among people; fear may be defined as beliefs about being punished or executed by the Khmer Rouge. That the majority of survivors has suffered from long-term mental health disorders, including post-traumatic stress disorder (PTSD; see, e.g., Beth et al. (2011)), suggests that fear may have prevailed over a long period of time under unstable situations of local guerrilla warfare.

We conjecture that fear was a key *motivating force* of couples' subsequent behaviors.<sup>48</sup> The couples might not have always felt fear, but rather fear might have been *induced* when the couples made decisions that could be influenced by the ideologies of the Pol Pot regime. This is consistent with Loewenstein (2000), who argues that powerful emotions are induced at the time of important decisions. Among Cambodians, parental investments in children's education, especially for male children and/or the first child, involve important and deliberate decisions.

Our conjecture is also consistent with recent empirical findings by Callen et al. (2014) regarding the relationships among violence, fear, and risk preferences in Afghanistan: Combining behavioral field experiments and administrative violence data, they find that individuals exposed to violence change their risk preferences only when they are primed with fear; neither psychological primes nor exposure to violence per se induces changes in risk preferences.

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<sup>48</sup>There is a growing body of literature on the role of emotions, including fear, in human decision making among both psychologists and economists (see, e.g., Elster (1998), Rick and Loewenstein (2008), Lerner et al. (2015) for reviews). However, little is known about the relationship of emotions and the institutions individuals face or the social structure in which individuals are embedded. Our study provides some insights into those relationships.

Second, whether the fear is induced and *causally* influences a specific economic behavior, such as educational investments in children after 1979, might have depended on the couples' social ties with the Khmer Rouge's society. Our conjecture is that since the couples whose first child was born during the Pol Pot regime, especially during an earlier period of the regime, were strongly embedded in the Khmer Rouge's society ("historical embeddedness," Granovetter (1985)), they might have felt a sense of belonging to the Khmer Rouge, having been persistently influenced by its ideologies under the potential threat of violence.

In social psychology, this behavioral tendency is known as "self-categorization," which generates a feeling of belonging and group identity and transforms individual thoughts, perceptions, and behaviors to conform to the prototype of the in-group (see, e.g., Hogg and Reid (2006), Hogg and Vaughan (2011, Chapter 7)). The relevant ideologies might include the denial of education and intellectuals and the state ownership of spouses and children, which may have led parents to invest less in children's education. As a result, their educational investments might have been susceptible to fear, and this might have been particularly strong for those who were more severely exposed to genocidal violence.

An alternative interpretation is also possible. As social situations were unstable after the collapse of the Pol Pot regime, the couples might have continued to face execution risk over time, while updating their perception about the risk. Since execution risk is unavoidable, non-tradable, and non-insurable, it might be regarded as "background risk" (e.g., Gollier and Pratt (1996), Eeckhoudt et al. (1996); see Dionne (2013) for a comprehensive review).<sup>49</sup> Couples' risk preference might endogenously change with the external environment; in particular, those who were more severely exposed to genocidal violence might have faced higher background risk, having become more risk-averse in their investments in children's education.<sup>50</sup>

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<sup>49</sup>Background risk is environmental risk often used to explain heterogeneity in risk attitudes. Background risk makes people less willing to take other risks under some regularity assumptions about preference (see, e.g., Guiso and Sodini (2013)).

<sup>50</sup>Some evidence suggests that fearful people make pessimistic risk estimates and risk-averse choices

## 7 Conclusions

This paper examined how the Cambodian genocide under the Pol Pot regime altered people’s post-conflict behaviors through institutional changes. Combining spatial genocide data and the 1998 Census microdata, we found that the genocide adversely influenced children’s educational outcomes among couples who had their first child during the Pol Pot era, but not afterward. Based on our econometric results, findings from the related literature, and the social context, we argued that since the former couples were strongly embedded in the Khmer Rouge’s society, they might have felt a sense of belonging to the Khmer Rouge and thus been persistently influenced by ideologies of the Pol Pot regime in unstable social situations. As a result, their behaviors might have been susceptible to the emotion of fear, and this behavioral tendency might have been strong for those who were severely exposed to genocidal violence.

Exploring the unique institutional catastrophe in Cambodia, our study provided insights into the complex relationships among violence, institutions, social structure, social situation, and economic behaviors. Our findings highlight the importance of carefully considering these elements in studying people’s post-conflict behaviors. Such considerations can lead to effective post-conflict policy design as well as a better understanding of human behavior.

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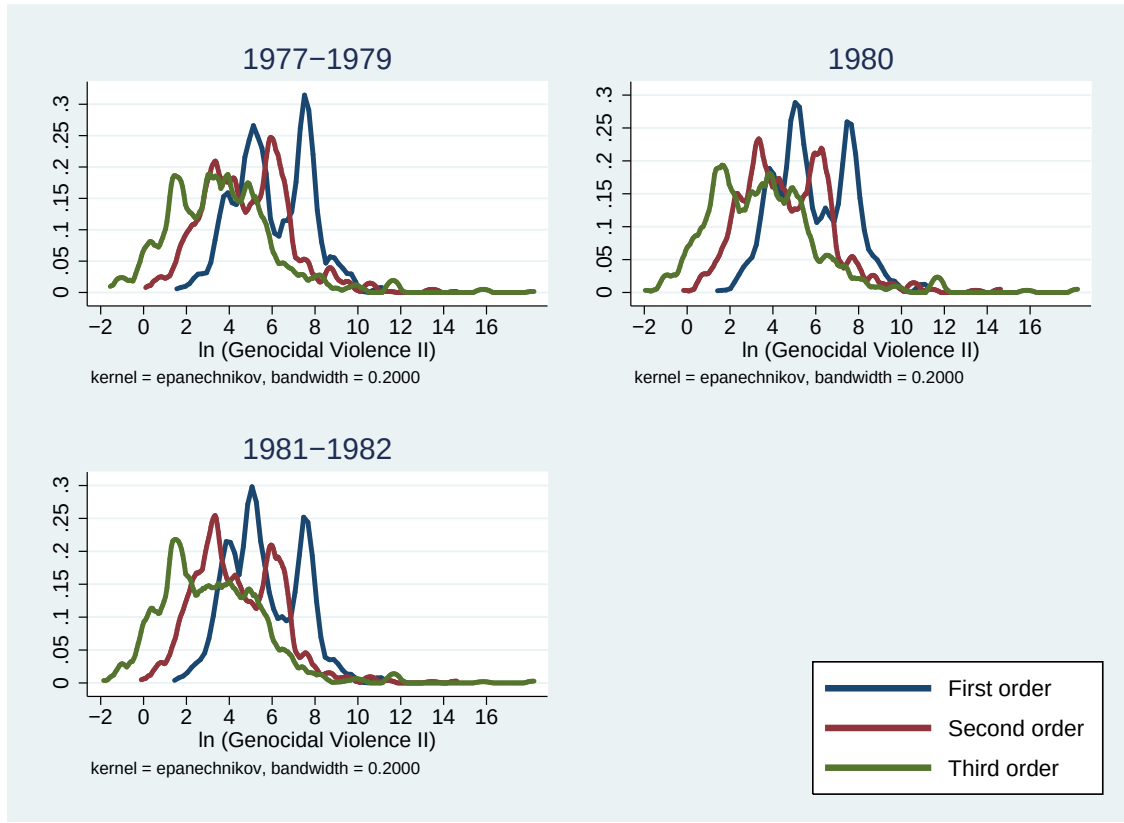


Figure A1: Distribution of Continuous Genocide Measures

*Note:* The figure provides kernel density of the distribution of the continuous genocide measures based on the first-, second-, and third-order polynomials in distance.

Table A1: Descriptive Statistics on Killing Sites

| Variable                 | Areas:                | Urban & Rural |          |           |            |           |
|--------------------------|-----------------------|---------------|----------|-----------|------------|-----------|
|                          | Corresponding sample: | Rural         | Sample I | Sample II | Sample III | Sample IV |
|                          |                       | (1)           | (2)      | (3)       | (4)        | (5)       |
| Prop. of killing sites   |                       | 0.642         | 0.664    | 0.667     | 0.722      | 1.000     |
| with info. about victims |                       | (0.480)       | (0.473)  | (0.472)   | (0.450)    | (0.000)   |
| ln (Num. of victims)     |                       | 6.518         | 6.468    | 6.468     | 6.015      | 6.015     |
|                          |                       | (1.940)       | (1.958)  | (1.958)   | (1.614)    | (1.614)   |
| Num. of killing sites    |                       | 514           | 435      | 433       | 115        | 83        |

*Notes:* The unit of observation is the killing site. Standard deviations are reported in parentheses.

Table A2: Location Determinants of Killing Sites

| Variable                                                       | Areas: | Urban & Rural        |                      | Rural                |                      |
|----------------------------------------------------------------|--------|----------------------|----------------------|----------------------|----------------------|
|                                                                |        | (1)                  | (2)                  | (3)                  | (4)                  |
| Distance to major roads (km)                                   |        | -0.006***<br>(0.001) | -0.008***<br>(0.001) | -0.005***<br>(0.001) | -0.008***<br>(0.001) |
| Prop. of non-migrant women<br>aged 36-50 with grade 1-5        |        | 0.086***<br>(0.020)  |                      | 0.085***<br>(0.020)  |                      |
| Prop. of non-migrant women<br>aged 36-50 with grade 6 or above |        | 0.291***<br>(0.033)  |                      | 0.268***<br>(0.035)  |                      |
| Prop. of migrant households                                    |        |                      | 0.039***<br>(0.013)  |                      | 0.027**<br>(0.013)   |
| Zone and district fixed effects                                |        | Yes                  | Yes                  | Yes                  | Yes                  |
| Observations                                                   |        | 8,247                | 10,503               | 7,903                | 10,022               |
| Prop. of villages located near K.S.                            |        | 0.234                | 0.235                | 0.227                | 0.224                |
| R-squared                                                      |        | 0.136                | 0.131                | 0.120                | 0.109                |

*Notes:* The table reports OLS estimates where the unit of observation is the village. The dependent variable is an indicator variable equal to 1 if villages are located within 3.0 km of killing sites and 0 otherwise. Robust standard errors are reported in parentheses. \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent level.



Table A3: Procedures for Constructing Baseline Sample for Analysis

| No.  | Description of conditions                                                                                                       | Observations |
|------|---------------------------------------------------------------------------------------------------------------------------------|--------------|
| (0)  | Total number of households in the complete set of the 1998 Census microdata is provided.                                        | 2,188,177    |
| (1)  | No households live in Phnom Penh, the capital city of Cambodia.                                                                 | 2,014,502    |
| (2)  | Households include a mother aged 34-45 and the oldest child aged 16-21.                                                         | 280,460      |
| (3)  | If mother's marital status is 'married,' then the households include a father.                                                  | 262,142      |
| (4)  | If households include father, then the difference in age between mother and father is in the range between -3 and 20.           | 250,972      |
| (5)  | Mother and father* were born in Cambodia.                                                                                       | 249,108      |
| (6)  | Mother and father* speak Khmer (Cambodian) as their mother tongue.                                                              | 240,598      |
| (7)  | Mother and father* believe in Buddhism.                                                                                         | 238,760      |
| (8)  | The highest grade of school that mother, father,* and children completed is not missing or other.                               | 238,112      |
| (9)  | The highest grade that mother and father* completed does not exceed the one they could attain before 1975.                      | 229,554      |
| (10) | The information of housing (light, fuel, water, and toilet) conditions is not missing or other.                                 | 219,320      |
| (11) | No households live in a 'special settlement.'                                                                                   | 218,815      |
| (12) | Number of children born alive to the mother is equal to number of children living together at the time of the 1998 Census.      | 147,740      |
| (13) | If the age of $i$ th child is the same as that of $i + 1$ th child, then the two children were born in the same birth district. | 147,461      |
| (14) | Mother's marital status is 'married.'                                                                                           | 128,988      |
| (15) | All households live in rural areas.                                                                                             | 113,640      |
| (16) | Both mother and father have never migrated outside their birth villages before.                                                 | 49,150       |

*Notes:* The table shows the procedures for developing the baseline sample used for our analysis. The sample is developed from the complete set of the 1998 Census microdata, with 2,188,177 households. Columns 2 and 3 describe conditions and the number of households that satisfy the conditions, respectively. 'father\*' is used only for 'married' households.

Table A4: Descriptive Statistics for Household Characteristics

| A. Households with their first child born in 1977-1979 |                    |                   |                   |                   |                   |  |
|--------------------------------------------------------|--------------------|-------------------|-------------------|-------------------|-------------------|--|
| Variable                                               | Sample: population | Sample I          | Sample II         | Sample III        | Sample IV         |  |
|                                                        | (1)                | (2)               | (3)               | (4)               | (5)               |  |
| A-1. Parental characteristics                          |                    |                   |                   |                   |                   |  |
| Mother's age                                           | 40.609<br>(2.714)  | 40.595<br>(2.714) | 40.565<br>(2.716) | 40.647<br>(2.667) | 40.621<br>(2.688) |  |
| Father's age                                           | 44.046<br>(4.632)  | 44.018<br>(4.617) | 43.964<br>(4.511) | 44.183<br>(4.521) | 44.295<br>(4.593) |  |
| Mother without any grade                               | 0.411<br>(0.492)   | 0.405<br>(0.491)  | 0.368<br>(0.482)  | 0.361<br>(0.480)  | 0.388<br>(0.488)  |  |
| Mother with grade 1-5                                  | 0.479<br>(0.500)   | 0.485<br>(0.500)  | 0.513<br>(0.500)  | 0.518<br>(0.500)  | 0.510<br>(0.500)  |  |
| Mother with grade 6 or above                           | 0.110<br>(0.313)   | 0.110<br>(0.313)  | 0.120<br>(0.324)  | 0.121<br>(0.326)  | 0.102<br>(0.303)  |  |
| Father without any grade                               | 0.200<br>(0.400)   | 0.195<br>(0.396)  | 0.169<br>(0.375)  | 0.161<br>(0.368)  | 0.174<br>(0.379)  |  |
| Father with grade 1-5                                  | 0.510<br>(0.500)   | 0.512<br>(0.500)  | 0.521<br>(0.500)  | 0.507<br>(0.500)  | 0.527<br>(0.500)  |  |
| Father with grade 6 or above                           | 0.290<br>(0.454)   | 0.293<br>(0.455)  | 0.310<br>(0.463)  | 0.332<br>(0.471)  | 0.300<br>(0.458)  |  |
| Observations                                           | 11,736             | 11,141            | 5,738             | 2,137             | 1,008             |  |
| A-2. Children's educational outcomes                   |                    |                   |                   |                   |                   |  |
| A-2-1. Age 15-21                                       |                    |                   |                   |                   |                   |  |
| No schooling                                           | 0.215<br>(0.362)   | 0.211<br>(0.359)  | 0.176<br>(0.331)  | 0.184<br>(0.335)  | 0.231<br>(0.367)  |  |
| Primary school completion                              | 0.317<br>(0.395)   | 0.324<br>(0.397)  | 0.357<br>(0.408)  | 0.354<br>(0.408)  | 0.317<br>(0.393)  |  |
| Years of schooling                                     | 4.186<br>(2.755)   | 4.242<br>(2.756)  | 4.544<br>(2.721)  | 4.513<br>(2.732)  | 4.176<br>(2.739)  |  |
| Observations                                           | 11,736             | 11,141            | 5,738             | 2,137             | 1,008             |  |
| A-2-2. Age 6-14                                        |                    |                   |                   |                   |                   |  |
| No schooling                                           | 0.349<br>(0.381)   | 0.346<br>(0.380)  | 0.308<br>(0.363)  | 0.311<br>(0.369)  | 0.342<br>(0.380)  |  |
| School attendance                                      | 0.634<br>(0.385)   | 0.638<br>(0.384)  | 0.674<br>(0.370)  | 0.668<br>(0.378)  | 0.637<br>(0.387)  |  |
| Grade progression                                      | -3.665<br>(1.485)  | -3.651<br>(1.480) | -3.539<br>(1.470) | -3.551<br>(1.473) | -3.669<br>(1.464) |  |
| Observations                                           | 11,087             | 10,520            | 5,402             | 2,027             | 951               |  |

*Continue*

Table A4: Descriptive Statistics for Household Characteristics

| B. Households with their first child born in 1980 |                    |                   |                   |                   |                   |  |
|---------------------------------------------------|--------------------|-------------------|-------------------|-------------------|-------------------|--|
| Variable                                          | Sample: population | Sample I          | Sample II         | Sample III        | Sample IV         |  |
|                                                   | (1)                | (2)               | (3)               | (4)               | (5)               |  |
| B-1. Parental characteristics                     |                    |                   |                   |                   |                   |  |
| Mother's age                                      | 39.386<br>(2.735)  | 39.379<br>(2.731) | 39.369<br>(2.723) | 39.398<br>(2.734) | 39.497<br>(2.794) |  |
| Father's age                                      | 42.178<br>(4.400)  | 42.163<br>(4.398) | 42.149<br>(4.364) | 42.253<br>(4.274) | 42.296<br>(4.427) |  |
| Mother without any grade                          | 0.426<br>(0.495)   | 0.418<br>(0.493)  | 0.385<br>(0.487)  | 0.388<br>(0.487)  | 0.423<br>(0.494)  |  |
| Mother with grade 1-5                             | 0.482<br>(0.500)   | 0.489<br>(0.500)  | 0.514<br>(0.500)  | 0.513<br>(0.500)  | 0.494<br>(0.500)  |  |
| Mother with grade 6 or above                      | 0.092<br>(0.290)   | 0.093<br>(0.291)  | 0.100<br>(0.300)  | 0.099<br>(0.299)  | 0.084<br>(0.277)  |  |
| Father without any grade                          | 0.212<br>(0.409)   | 0.208<br>(0.406)  | 0.187<br>(0.390)  | 0.186<br>(0.389)  | 0.220<br>(0.414)  |  |
| Father with grade 1-5                             | 0.531<br>(0.499)   | 0.534<br>(0.499)  | 0.540<br>(0.498)  | 0.532<br>(0.499)  | 0.525<br>(0.500)  |  |
| Father with grade 6 or above                      | 0.257<br>(0.437)   | 0.258<br>(0.437)  | 0.273<br>(0.445)  | 0.282<br>(0.450)  | 0.255<br>(0.436)  |  |
| Observations                                      | 11,235             | 10,642            | 5,474             | 2,154             | 1,015             |  |
| B-2. Children's educational outcomes              |                    |                   |                   |                   |                   |  |
| B-2-1. Age 15-18                                  |                    |                   |                   |                   |                   |  |
| No schooling                                      | 0.202<br>(0.365)   | 0.196<br>(0.360)  | 0.167<br>(0.337)  | 0.175<br>(0.344)  | 0.222<br>(0.374)  |  |
| Primary school completion                         | 0.342<br>(0.420)   | 0.349<br>(0.422)  | 0.381<br>(0.432)  | 0.378<br>(0.430)  | 0.319<br>(0.412)  |  |
| Years of schooling                                | 4.325<br>(2.823)   | 4.385<br>(2.821)  | 4.674<br>(2.819)  | 4.636<br>(2.837)  | 4.177<br>(2.788)  |  |
| Observations                                      | 11,235             | 10,642            | 5,474             | 2,154             | 1,015             |  |
| B-2-2. Age 6-14                                   |                    |                   |                   |                   |                   |  |
| No schooling                                      | 0.339<br>(0.368)   | 0.332<br>(0.365)  | 0.300<br>(0.350)  | 0.299<br>(0.357)  | 0.346<br>(0.375)  |  |
| School attendance                                 | 0.645<br>(0.371)   | 0.652<br>(0.369)  | 0.683<br>(0.356)  | 0.683<br>(0.361)  | 0.637<br>(0.379)  |  |
| Grade progression                                 | -3.620<br>(1.447)  | -3.601<br>(1.440) | -3.508<br>(1.427) | -3.529<br>(1.414) | -3.623<br>(1.391) |  |
| Observations                                      | 10,747             | 10,185            | 5,246             | 2,068             | 974               |  |

*Continue*

Table A4: Descriptive Statistics for Household Characteristics

| C. Households with their first child born in 1981-1982 |         |                     |                   |                   |                   |                   |
|--------------------------------------------------------|---------|---------------------|-------------------|-------------------|-------------------|-------------------|
|                                                        | Sample: | Study<br>population | Sample I          | Sample II         | Sample III        | Sample IV         |
| Variable                                               |         | (1)                 | (2)               | (3)               | (4)               | (5)               |
| C-1. Parental characteristics                          |         |                     |                   |                   |                   |                   |
| Mother's age                                           |         | 38.270<br>(2.854)   | 38.266<br>(2.858) | 38.238<br>(2.846) | 38.162<br>(2.830) | 38.144<br>(2.848) |
| Father's age                                           |         | 40.816<br>(4.598)   | 40.794<br>(4.583) | 40.790<br>(4.552) | 40.738<br>(4.468) | 40.732<br>(4.545) |
| Mother without any grade                               |         | 0.463<br>(0.499)    | 0.453<br>(0.498)  | 0.420<br>(0.494)  | 0.418<br>(0.493)  | 0.452<br>(0.498)  |
| Mother with grade 1-5                                  |         | 0.468<br>(0.499)    | 0.477<br>(0.499)  | 0.504<br>(0.500)  | 0.503<br>(0.500)  | 0.477<br>(0.500)  |
| Mother with grade 6 or above                           |         | 0.069<br>(0.254)    | 0.070<br>(0.255)  | 0.076<br>(0.265)  | 0.079<br>(0.270)  | 0.071<br>(0.256)  |
| Father without any grade                               |         | 0.255<br>(0.436)    | 0.251<br>(0.433)  | 0.219<br>(0.413)  | 0.225<br>(0.418)  | 0.231<br>(0.422)  |
| Father with grade 1-5                                  |         | 0.543<br>(0.498)    | 0.546<br>(0.498)  | 0.561<br>(0.496)  | 0.548<br>(0.498)  | 0.546<br>(0.498)  |
| Father with grade 6 or above                           |         | 0.203<br>(0.402)    | 0.204<br>(0.403)  | 0.221<br>(0.415)  | 0.227<br>(0.419)  | 0.222<br>(0.416)  |
| Observations                                           |         | 20,564              | 19,271            | 9,744             | 4,011             | 1,798             |
| C-2. Children's educational outcomes                   |         |                     |                   |                   |                   |                   |
| C-2-1. Age 15-17                                       |         |                     |                   |                   |                   |                   |
| No schooling                                           |         | 0.204<br>(0.389)    | 0.199<br>(0.385)  | 0.165<br>(0.358)  | 0.174<br>(0.365)  | 0.200<br>(0.383)  |
| Primary school completion                              |         | 0.327<br>(0.448)    | 0.333<br>(0.451)  | 0.369<br>(0.462)  | 0.361<br>(0.459)  | 0.307<br>(0.440)  |
| Years of schooling                                     |         | 4.204<br>(2.873)    | 4.257<br>(2.875)  | 4.568<br>(2.873)  | 4.548<br>(2.898)  | 4.171<br>(2.819)  |
| Observations                                           |         | 20,564              | 19,271            | 9,744             | 4,011             | 1,798             |
| C-2-2. Age 6-14                                        |         |                     |                   |                   |                   |                   |
| No schooling                                           |         | 0.348<br>(0.368)    | 0.342<br>(0.365)  | 0.305<br>(0.347)  | 0.297<br>(0.346)  | 0.333<br>(0.360)  |
| School attendance                                      |         | 0.634<br>(0.372)    | 0.640<br>(0.369)  | 0.677<br>(0.353)  | 0.683<br>(0.353)  | 0.647<br>(0.364)  |
| Grade progression                                      |         | -3.593<br>(1.427)   | -3.571<br>(1.420) | -3.441<br>(1.403) | -3.407<br>(1.390) | -3.548<br>(1.392) |
| Observations                                           |         | 19,918              | 18,661            | 9,416             | 3,900             | 1,752             |

*Notes:* The standard deviations are reported in parentheses. Study population – households living in the districts surveyed and not surveyed by DC-Cam; Sample I – households living in the districts surveyed by DC-Cam; Sample II – households living within 6.0 km of the killing sites in the surveyed districts; Sample III – households living within 6.0 km of the selected killing sites (the 6.0 km spatially balanced clusters) in the surveyed districts; Sample IV – households of Sample III with complete victim information for all killing sites located within 6.0 km of the villages where they live.

Table A5: Descriptive Statistics for Village Characteristics

| Variable                                               | Study              |                  |                  |                  |                  |
|--------------------------------------------------------|--------------------|------------------|------------------|------------------|------------------|
|                                                        | Sample: population | Sample I         | Sample II        | Sample III       | Sample IV        |
|                                                        | (1)                | (2)              | (3)              | (4)              | (5)              |
| A. Households with their first child born in 1977-1979 |                    |                  |                  |                  |                  |
| Distance to major roads (km)                           | 9.952<br>(12.391)  | 8.829<br>(9.295) | 8.466<br>(9.285) | 8.748<br>(9.870) | 8.936<br>(8.814) |
| Prop. of non-migrant women                             | 0.484              | 0.475            | 0.448            | 0.452            | 0.476            |
| aged 36-50 without any grade                           | (0.229)            | (0.227)          | (0.221)          | (0.226)          | (0.226)          |
| Prop. of non-migrant women                             | 0.414              | 0.422            | 0.442            | 0.438            | 0.430            |
| aged 36-50 with grade 1-5                              | (0.207)            | (0.206)          | (0.201)          | (0.208)          | (0.210)          |
| Prop. of non-migrant women                             | 0.102              | 0.103            | 0.109            | 0.111            | 0.095            |
| aged 36-50 with grade 6 or above                       | (0.116)            | (0.115)          | (0.115)          | (0.119)          | (0.101)          |
| Observations                                           | 4,286              | 3,989            | 1,979            | 839              | 376              |
| B. Households with their first child born in 1980      |                    |                  |                  |                  |                  |
| Distance to major roads (km)                           | 9.559<br>(11.569)  | 8.660<br>(9.177) | 8.419<br>(9.234) | 8.861<br>(9.701) | 9.577<br>(9.138) |
| Prop. of non-migrant women                             | 0.480              | 0.472            | 0.444            | 0.448            | 0.478            |
| aged 36-50 without any grade                           | (0.228)            | (0.226)          | (0.221)          | (0.226)          | (0.227)          |
| Prop. of non-migrant women                             | 0.416              | 0.424            | 0.443            | 0.438            | 0.427            |
| aged 36-50 with grade 1-5                              | (0.207)            | (0.206)          | (0.202)          | (0.209)          | (0.211)          |
| Prop. of non-migrant women                             | 0.104              | 0.104            | 0.112            | 0.114            | 0.094            |
| aged 36-50 with grade 6 or above                       | (0.118)            | (0.117)          | (0.118)          | (0.121)          | (0.104)          |
| Observations                                           | 4,448              | 4,154            | 2,098            | 889              | 403              |
| C. Households with their first child born in 1981-1982 |                    |                  |                  |                  |                  |
| Distance to major roads (km)                           | 9.731<br>(11.903)  | 8.686<br>(9.075) | 8.422<br>(9.123) | 8.595<br>(9.495) | 9.466<br>(8.684) |
| Prop. of non-migrant women                             | 0.492              | 0.482            | 0.456            | 0.457            | 0.483            |
| aged 36-50 without any grade                           | (0.233)            | (0.230)          | (0.222)          | (0.222)          | (0.222)          |
| Prop. of non-migrant women                             | 0.408              | 0.417            | 0.436            | 0.433            | 0.427            |
| aged 36-50 with grade 1-5                              | (0.211)            | (0.209)          | (0.205)          | (0.208)          | (0.209)          |
| Prop. of non-migrant women                             | 0.100              | 0.101            | 0.108            | 0.110            | 0.091            |
| aged 36-50 with grade 6 or above                       | (0.118)            | (0.117)          | (0.117)          | (0.119)          | (0.110)          |
| Observations                                           | 5,595              | 5,197            | 2,577            | 1,128            | 512              |

*Note:* See the notes to Appendix Table A4.

Table A6: Difference in Mean Household Characteristics across Subsamples

| Variable                                     | Sample: Sample III |                     |                     | Sample IV           |                     |                     |
|----------------------------------------------|--------------------|---------------------|---------------------|---------------------|---------------------|---------------------|
|                                              | Reference sample:  |                     | 1980                | 1977-79             |                     | 1980                |
|                                              | vs.                | 1977-79             | 1980                | vs.                 | 1977-79             | 1980                |
|                                              |                    | (1)                 | (2)                 |                     | (3)                 | (4)                 |
| Mother's age                                 |                    | 0.029***<br>(0.003) | 0.046***<br>(0.002) | 0.029***<br>(0.003) | 0.022***<br>(0.005) | 0.044***<br>(0.004) |
| Father's age                                 |                    | 0.013***<br>(0.002) | 0.013***<br>(0.002) | 0.005***<br>(0.002) | 0.014***<br>(0.003) | 0.015***<br>(0.003) |
| Mother with grade 1-5                        |                    | 0.014<br>(0.018)    | 0.021<br>(0.013)    | -0.001<br>(0.015)   | 0.015<br>(0.026)    | 0.045**<br>(0.019)  |
| Mother with grade 6 or above                 |                    | 0.014<br>(0.030)    | -0.015<br>(0.023)   | -0.033<br>(0.026)   | 0.043<br>(0.049)    | 0.009<br>(0.034)    |
| Father with grade 1-5                        |                    | 0.026<br>(0.023)    | 0.017<br>(0.015)    | 0.012<br>(0.017)    | 0.053*<br>(0.031)   | 0.01<br>(0.024)     |
| Father with grade 6 or above                 |                    | 0.040<br>(0.026)    | 0.060***<br>(0.019) | 0.036*<br>(0.020)   | 0.056<br>(0.037)    | 0.031<br>(0.028)    |
| Zone and district fixed effects              |                    | Yes                 | Yes                 | Yes                 | Yes                 | Yes                 |
| Observations                                 |                    | 4,291               | 6,148               | 6,165               | 2,023               | 2,806               |
| Observations (Reference sample)              |                    | 2,137               | 2,137               | 2,154               | 1,008               | 1,015               |
| R-squared                                    |                    | 0.135               | 0.234               | 0.099               | 0.116               | 0.228               |
| p-value of the listed variables              |                    | 0.000               | 0.000               | 0.000               | 0.000               | 0.000               |
| p-value of the listed variables on education |                    | 0.376               | 0.004               | 0.396               | 0.288               | 0.120               |

Notes: The table reports OLS estimates where the unit of observation is the household. The dependent variable is an indicator variable equal to 1 if households are included in the reference sample and 0 otherwise. Robust standard errors are reported in parentheses.  $p$ -values are from  $F$ -tests for the joint significance of all listed variables. \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent level.

Table A7: Difference in Mean Household and Village Characteristics across Samples

| A. Households with their first child born in 1977-1979           |                      |                      |                        |                      |                         |                     |                      |                     |                                       |                                       |
|------------------------------------------------------------------|----------------------|----------------------|------------------------|----------------------|-------------------------|---------------------|----------------------|---------------------|---------------------------------------|---------------------------------------|
| Variable                                                         | Reference sample:    |                      | Study population       |                      |                         |                     | Sample I             |                     | Sample II<br>vs.<br>Sample III<br>(6) | Sample III<br>vs.<br>Sample IV<br>(7) |
|                                                                  | Sample I<br>(1)      | Sample II<br>(2)     | vs.<br>Sample I<br>(1) | Sample III<br>(3)    | vs.<br>Sample II<br>(2) | Sample IV<br>(4)    | Sample II<br>(5)     |                     |                                       |                                       |
| Limited sample:                                                  |                      |                      |                        |                      |                         |                     |                      |                     |                                       |                                       |
| A-1. Parental characteristics                                    |                      |                      |                        |                      |                         |                     |                      |                     |                                       |                                       |
| Mother's age                                                     | 0.000<br>(0.001)     | 0.000<br>(0.002)     | -0.001<br>(0.002)      | -0.001<br>(0.001)    | -0.001<br>(0.002)       | -0.002<br>(0.002)   | -0.001<br>(0.002)    | -0.002<br>(0.002)   | 0.002<br>(0.003)                      |                                       |
| Father's age                                                     | 0.000<br>(0.001)     | 0.000<br>(0.001)     | 0.001<br>(0.001)       | 0.002**<br>(0.001)   | 0.001<br>(0.001)        | 0.000<br>(0.001)    | 0.001<br>(0.001)     | 0.000<br>(0.001)    | 0.002<br>(0.002)                      |                                       |
| Mother with grade 1-5                                            | 0.007<br>(0.004)     | 0.047***<br>(0.010)  | 0.022***<br>(0.008)    | 0.002<br>(0.006)     | 0.037***<br>(0.010)     | 0.008<br>(0.011)    | 0.037***<br>(0.010)  | 0.008<br>(0.011)    | -0.011<br>(0.017)                     |                                       |
| Mother with grade 6 or above                                     | 0.001<br>(0.007)     | 0.058***<br>(0.017)  | 0.017<br>(0.013)       | -0.006<br>(0.009)    | 0.056***<br>(0.015)     | -0.002<br>(0.017)   | 0.056***<br>(0.015)  | -0.002<br>(0.017)   | -0.037<br>(0.025)                     |                                       |
| Father with grade 1-5                                            | 0.012*<br>(0.006)    | 0.049***<br>(0.013)  | 0.016*<br>(0.009)      | 0.005<br>(0.007)     | 0.039***<br>(0.012)     | 0.006<br>(0.013)    | 0.039***<br>(0.012)  | 0.006<br>(0.013)    | -0.002<br>(0.022)                     |                                       |
| Father with grade 6 or above                                     | 0.012*<br>(0.007)    | 0.068***<br>(0.014)  | 0.040***<br>(0.011)    | 0.009<br>(0.008)     | 0.069***<br>(0.014)     | 0.018<br>(0.015)    | 0.069***<br>(0.014)  | 0.018<br>(0.015)    | -0.011<br>(0.023)                     |                                       |
| Zone fixed effects                                               | Yes                  | Yes                  | Yes                    | Yes                  | Yes                     | Yes                 | Yes                  | Yes                 | Yes                                   |                                       |
| District fixed effects                                           | No                   | No                   | No                     | No                   | No                      | No                  | Yes                  | Yes                 | Yes                                   |                                       |
| Observations                                                     | 11,736               | 11,736               | 11,736                 | 11,736               | 11,141                  | 5,738               | 11,141               | 5,738               | 2,137                                 |                                       |
| Observations (Limited sample)                                    | 11,141               | 5,738                | 2,137                  | 1,008                | 5,738                   | 2,137               | 5,738                | 2,137               | 1,008                                 |                                       |
| R-squared                                                        | 0.120                | 0.054                | 0.020                  | 0.016                | 0.236                   | 0.506               | 0.236                | 0.506               | 0.577                                 |                                       |
| p-value of the listed variables                                  | 0.095                | 0.000                | 0.000                  | 0.162                | 0.000                   | 0.770               | 0.000                | 0.770               | 0.538                                 |                                       |
| A-2. Village characteristics                                     |                      |                      |                        |                      |                         |                     |                      |                     |                                       |                                       |
| Distance to major roads (km)                                     | -0.006***<br>(0.000) | -0.004***<br>(0.001) | -0.001<br>(0.000)      | -0.001***<br>(0.000) | -0.005***<br>(0.001)    | 0.014***<br>(0.002) | -0.005***<br>(0.001) | 0.014***<br>(0.002) | 0.022***<br>(0.006)                   |                                       |
| Proportion of non-migrant women aged 36-50 with grade 1-5        | 0.068***<br>(0.018)  | 0.232***<br>(0.037)  | 0.078**<br>(0.030)     | -0.010<br>(0.022)    | 0.132***<br>(0.042)     | 0.025<br>(0.052)    | 0.132***<br>(0.042)  | 0.025<br>(0.052)    | -0.013<br>(0.077)                     |                                       |
| Proportion of non-migrant women aged 36-50 with grade 6 or above | -0.033<br>(0.035)    | 0.224***<br>(0.066)  | 0.123**<br>(0.053)     | -0.048<br>(0.034)    | 0.288***<br>(0.069)     | 0.136*<br>(0.082)   | 0.288***<br>(0.069)  | 0.136*<br>(0.082)   | -0.075<br>(0.127)                     |                                       |
| Zone fixed effects                                               | Yes                  | Yes                  | Yes                    | Yes                  | Yes                     | Yes                 | Yes                  | Yes                 | Yes                                   |                                       |
| District fixed effects                                           | No                   | No                   | No                     | No                   | No                      | No                  | Yes                  | Yes                 | Yes                                   |                                       |
| Observations                                                     | 4,286                | 4,286                | 4,286                  | 4,286                | 3,989                   | 1,979               | 3,989                | 1,979               | 839                                   |                                       |
| Observations (Limited sample)                                    | 3,989                | 1,979                | 839                    | 376                  | 1,979                   | 839                 | 1,979                | 839                 | 376                                   |                                       |
| R-squared                                                        | 0.217                | 0.057                | 0.019                  | 0.015                | 0.209                   | 0.502               | 0.209                | 0.502               | 0.558                                 |                                       |
| p-value of the listed variables                                  | 0.000                | 0.000                | 0.003                  | 0.021                | 0.000                   | 0.000               | 0.000                | 0.000               | 0.002                                 |                                       |

*Continue*

Table A7: Difference in Mean Household and Village Characteristics across Samples

| B. Households with their first child born in 1980                |  |                      |            |                      |            |                     |            |                    |            |                     |            |                     |            |                      |            |
|------------------------------------------------------------------|--|----------------------|------------|----------------------|------------|---------------------|------------|--------------------|------------|---------------------|------------|---------------------|------------|----------------------|------------|
| Reference sample:                                                |  | Study population     |            |                      |            |                     |            |                    |            |                     |            |                     |            |                      |            |
|                                                                  |  | Sample I<br>(1)      | vs.<br>(1) | Sample II<br>(2)     | vs.<br>(2) | Sample III<br>(3)   | vs.<br>(3) | Sample IV<br>(4)   | vs.<br>(4) | Sample I<br>(5)     | vs.<br>(5) | Sample II<br>(6)    | vs.<br>(6) | Sample III<br>(7)    | vs.<br>(7) |
| Limited sample:                                                  |  |                      |            |                      |            |                     |            |                    |            |                     |            |                     |            |                      |            |
| Variable                                                         |  |                      |            |                      |            |                     |            |                    |            |                     |            |                     |            |                      |            |
| B-1. Parental characteristics                                    |  |                      |            |                      |            |                     |            |                    |            |                     |            |                     |            |                      |            |
| Mother's age                                                     |  | 0.000<br>(0.001)     |            | 0.001<br>(0.002)     |            | -0.001<br>(0.002)   |            | 0.002<br>(0.001)   |            | 0.001<br>(0.002)    |            | -0.001<br>(0.002)   |            | 0.001<br>(0.003)     |            |
| Father's age                                                     |  | 0.000<br>(0.001)     |            | 0.000<br>(0.001)     |            | 0.001<br>(0.001)    |            | 0.000<br>(0.001)   |            | 0.000<br>(0.001)    |            | 0.001<br>(0.001)    |            | 0.004*<br>(0.002)    |            |
| Mother with grade 1-5                                            |  | 0.012***<br>(0.005)  |            | 0.043***<br>(0.011)  |            | 0.013<br>(0.008)    |            | -0.004<br>(0.006)  |            | 0.017<br>(0.010)    |            | 0.000<br>(0.012)    |            | -0.004<br>(0.017)    |            |
| Mother with grade 6 or above                                     |  | 0.011<br>(0.008)     |            | 0.052***<br>(0.018)  |            | 0.011<br>(0.015)    |            | -0.011<br>(0.010)  |            | 0.026<br>(0.017)    |            | -0.006<br>(0.020)   |            | 0.002<br>(0.026)     |            |
| Father with grade 1-5                                            |  | 0.009<br>(0.006)     |            | 0.032**<br>(0.013)   |            | 0.006<br>(0.010)    |            | -0.012<br>(0.007)  |            | 0.017<br>(0.012)    |            | 0.005<br>(0.014)    |            | -0.017<br>(0.021)    |            |
| Father with grade 6 or above                                     |  | 0.005<br>(0.007)     |            | 0.056***<br>(0.015)  |            | 0.023**<br>(0.012)  |            | -0.008<br>(0.009)  |            | 0.046***<br>(0.014) |            | 0.023<br>(0.016)    |            | -0.068***<br>(0.024) |            |
| Zone fixed effects                                               |  | Yes                  |            | Yes                  |            | Yes                 |            | Yes                |            | Yes                 |            | Yes                 |            | Yes                  |            |
| District fixed effects                                           |  | No                   |            | No                   |            | No                  |            | No                 |            | No                  |            | No                  |            | No                   |            |
| Observations                                                     |  | 11,235               |            | 11,235               |            | 11,235              |            | 11,235             |            | 10,642              |            | 5,474               |            | 2,154                |            |
| Observations (Limited sample)                                    |  | 10,642               |            | 5,474                |            | 2,154               |            | 1,015              |            | 5,474               |            | 2,154               |            | 1,015                |            |
| R-squared                                                        |  | 0.118                |            | 0.045                |            | 0.020               |            | 0.017              |            | 0.195               |            | 0.453               |            | 0.601                |            |
| p-value of the listed variables                                  |  | 0.019                |            | 0.000                |            | 0.067               |            | 0.205              |            | 0.001               |            | 0.771               |            | 0.021                |            |
| B-2. Village characteristics                                     |  |                      |            |                      |            |                     |            |                    |            |                     |            |                     |            |                      |            |
| Distance to major roads (km)                                     |  | -0.006***<br>(0.000) |            | -0.004***<br>(0.001) |            | 0.000<br>(0.001)    |            | 0.000<br>(0.000)   |            | -0.002<br>(0.001)   |            | 0.015***<br>(0.002) |            | 0.022***<br>(0.006)  |            |
| Proportion of non-migrant women aged 36-50 with grade 1-5        |  | 0.080***<br>(0.017)  |            | 0.239***<br>(0.036)  |            | 0.065**<br>(0.030)  |            | -0.016<br>(0.022)  |            | 0.143***<br>(0.041) |            | 0.053<br>(0.050)    |            | -0.080<br>(0.073)    |            |
| Proportion of non-migrant women aged 36-50 with grade 6 or above |  | -0.038<br>(0.033)    |            | 0.275***<br>(0.064)  |            | 0.149***<br>(0.051) |            | -0.057*<br>(0.033) |            | 0.363***<br>(0.066) |            | 0.054<br>(0.079)    |            | -0.122<br>(0.119)    |            |
| Zone fixed effects                                               |  | Yes                  |            | Yes                  |            | Yes                 |            | Yes                |            | Yes                 |            | Yes                 |            | Yes                  |            |
| District fixed effects                                           |  | No                   |            | No                   |            | No                  |            | No                 |            | No                  |            | No                  |            | No                   |            |
| Observations                                                     |  | 4,448                |            | 4,448                |            | 4,448               |            | 4,448              |            | 4,154               |            | 2,098               |            | 889                  |            |
| Observations (Limited sample)                                    |  | 4,154                |            | 2,098                |            | 889                 |            | 403                |            | 2,098               |            | 889                 |            | 403                  |            |
| R-squared                                                        |  | 0.192                |            | 0.059                |            | 0.023               |            | 0.015              |            | 0.198               |            | 0.474               |            | 0.575                |            |
| p-value of the listed variables                                  |  | 0.000                |            | 0.000                |            | 0.007               |            | 0.192              |            | 0.000               |            | 0.000               |            | 0.001                |            |
| Continue                                                         |  |                      |            |                      |            |                     |            |                    |            |                     |            |                     |            |                      |            |

*Continue*



Table A7: Difference in Mean Household and Village Characteristics across Samples

| C. Households with their first child born in 1981-1982           |  |                        |                         |                          |                         |                         |                          |                         |  |
|------------------------------------------------------------------|--|------------------------|-------------------------|--------------------------|-------------------------|-------------------------|--------------------------|-------------------------|--|
| Reference sample:                                                |  | Study population       |                         |                          |                         |                         |                          |                         |  |
|                                                                  |  | vs.<br>Sample I<br>(1) | vs.<br>Sample II<br>(2) | vs.<br>Sample III<br>(3) | vs.<br>Sample IV<br>(4) | vs.<br>Sample II<br>(5) | vs.<br>Sample III<br>(6) | vs.<br>Sample IV<br>(7) |  |
| Limited sample:                                                  |  |                        |                         |                          |                         |                         |                          |                         |  |
| Variable                                                         |  |                        |                         |                          |                         |                         |                          |                         |  |
| C-1. Parental characteristics                                    |  |                        |                         |                          |                         |                         |                          |                         |  |
| Mother's age                                                     |  | 0.000<br>(0.001)       | -0.002<br>(0.002)       | -0.004***<br>(0.001)     | -0.002*<br>(0.001)      | -0.002<br>(0.001)       | -0.005***<br>(0.002)     | 0.003<br>(0.002)        |  |
| Father's age                                                     |  | 0.000<br>(0.000)       | 0.000<br>(0.001)        | 0.001<br>(0.001)         | 0.000<br>(0.001)        | 0.000<br>(0.001)        | 0.001<br>(0.001)         | -0.001<br>(0.002)       |  |
| Mother with grade 1-5                                            |  | 0.021***<br>(0.004)    | 0.042***<br>(0.008)     | 0.020***<br>(0.006)      | -0.005<br>(0.004)       | 0.012<br>(0.007)        | 0.022***<br>(0.008)      | -0.005<br>(0.013)       |  |
| Mother with grade 6 or above                                     |  | 0.022***<br>(0.007)    | 0.055***<br>(0.015)     | 0.032***<br>(0.013)      | -0.004<br>(0.009)       | 0.028**<br>(0.014)      | 0.033*<br>(0.017)        | -0.015<br>(0.023)       |  |
| Father with grade 1-5                                            |  | 0.000<br>(0.004)       | 0.053***<br>(0.009)     | 0.009<br>(0.007)         | 0.004<br>(0.005)        | 0.044***<br>(0.009)     | -0.010<br>(0.010)        | -0.009<br>(0.015)       |  |
| Father with grade 6 or above                                     |  | -0.004<br>(0.006)      | 0.080***<br>(0.011)     | 0.027***<br>(0.009)      | 0.015**<br>(0.007)      | 0.077***<br>(0.011)     | -0.005<br>(0.013)        | 0.014<br>(0.018)        |  |
| Zone fixed effects                                               |  | Yes                    | Yes                     | Yes                      | Yes                     | Yes                     | Yes                      | Yes                     |  |
| District fixed effects                                           |  | No                     | No                      | No                       | No                      | Yes                     | Yes                      | Yes                     |  |
| Observations                                                     |  | 20,564                 | 20,564                  | 20,564                   | 20,564                  | 19,271                  | 9,744                    | 4,011                   |  |
| Observations (Limited sample)                                    |  | 19,271                 | 9,744                   | 4,011                    | 1,798                   | 9,744                   | 4,011                    | 1,798                   |  |
| R-squared                                                        |  | 0.118                  | 0.042                   | 0.016                    | 0.013                   | 0.201                   | 0.471                    | 0.547                   |  |
| <i>p</i> -value of the listed variables                          |  | 0.000                  | 0.000                   | 0.000                    | 0.133                   | 0.000                   | 0.007                    | 0.627                   |  |
| C-2. Village characteristics                                     |  |                        |                         |                          |                         |                         |                          |                         |  |
| Distance to major roads (km)                                     |  | -0.006***<br>(0.000)   | -0.004***<br>(0.001)    | 0.000<br>(0.000)         | 0.000<br>(0.000)        | -0.004***<br>(0.001)    | 0.014***<br>(0.002)      | 0.021***<br>(0.005)     |  |
| Proportion of non-migrant women aged 36-50 with grade 1-5        |  | 0.082***<br>(0.015)    | 0.219***<br>(0.032)     | 0.078***<br>(0.026)      | 0.000<br>(0.019)        | 0.098***<br>(0.036)     | 0.031<br>(0.043)         | -0.024<br>(0.063)       |  |
| Proportion of non-migrant women aged 36-50 with grade 6 or above |  | -0.027<br>(0.030)      | 0.235***<br>(0.057)     | 0.137***<br>(0.045)      | -0.059*<br>(0.031)      | 0.273***<br>(0.059)     | 0.064<br>(0.076)         | -0.034<br>(0.113)       |  |
| Zone fixed effects                                               |  | Yes                    | Yes                     | Yes                      | Yes                     | Yes                     | Yes                      | Yes                     |  |
| District fixed effects                                           |  | No                     | No                      | No                       | No                      | Yes                     | Yes                      | Yes                     |  |
| Observations                                                     |  | 5,595                  | 5,595                   | 5,595                    | 5,595                   | 5,197                   | 2,577                    | 1,128                   |  |
| Observations (Limited sample)                                    |  | 5,197                  | 2,577                   | 1,128                    | 512                     | 2,577                   | 1,128                    | 512                     |  |
| R-squared                                                        |  | 0.208                  | 0.051                   | 0.022                    | 0.014                   | 0.197                   | 0.474                    | 0.564                   |  |
| <i>p</i> -value of the listed variables                          |  | 0.000                  | 0.000                   | 0.000                    | 0.116                   | 0.000                   | 0.000                    | 0.000                   |  |

Notes: The table reports OLS estimates where the unit of observation is the household in panels A-1, B-1, and C-1 and the village in panels A-2, B-2, and C-2. The dependent variable is an indicator variable equal to 1 if households/villages are included in both the reference and limited samples and 0 otherwise. Robust standard errors are reported in parentheses. The regressions in columns 1-4 do not include district fixed effects because about 60 districts in the study population (districts with white background, not surveyed by DC-Cam) are not included in Samples I, II, III (see Figure 3). *p*-values are from *F*-tests for the joint significance of the listed variables. \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent level.

Table A8: Procedures for Constructing Sample for Fisher's Exact Tests

| No.  | Description of conditions                                                                                                       | Observations |
|------|---------------------------------------------------------------------------------------------------------------------------------|--------------|
| (0)  | Total number of households in the complete set of the 1998 Census microdata is provided.                                        | 2,188,177    |
| (1)  | No households live in Phnom Penh, the capital city of Cambodia.                                                                 | 2,014,502    |
| (2)  | Households include a mother aged 34-45 and the oldest child aged 16-21.                                                         | 280,460      |
| (3)  | If mother's marital status is 'married,' then the households include a father.                                                  | 262,142      |
| (4)  | If households include father, then the difference in age between mother and father is in the range between -3 and 20.           | 250,972      |
| (5)  | Mother and father* were born in Cambodia.                                                                                       | 249,108      |
| (6)  | Mother and father* speak Khmer (Cambodian) as their mother tongue.                                                              | 240,598      |
| (7)  | Mother and father* believe in Buddhism.                                                                                         | 238,760      |
| (8)  | No households live in a 'special settlement.'                                                                                   | 238,205      |
| (9)  | Number of children born alive to the mother is equal to number of children living together at the time of the 1998 Census.      | 161,362      |
| (10) | If the age of $i$ th child is the same as that of $i + 1$ th child, then the two children were born in the same birth district. | 161,048      |
| (11) | Mother's marital status is 'married.'                                                                                           | 141,282      |
| (12) | No households include grandfather, grandmother, grandchild, other relatives, or non-relatives.                                  | 110,646      |
| (13) | All children in households speak Khmer (Cambodian) as their mother tongue.                                                      | 110,496      |
| (14) | All children in households believe in Buddhism.                                                                                 | 110,425      |
| (15) | All children in households have never married.                                                                                  | 108,518      |

Notes: The table shows the procedures for constructing the sample used for Fisher's exact tests. See the notes to Appendix Table A3.

Table A9: Alternative Samples for Fisher’s Exact Tests

| Sample:                  | FET<br>Sample III<br>(1) | FET<br>Sample III-A<br>(2) | FET<br>Sample III-B<br>(3) | FET<br>Sample III-C<br>(4) |
|--------------------------|--------------------------|----------------------------|----------------------------|----------------------------|
| Age of first child       | 16-21                    | 16-21                      | 16-21                      | -                          |
| Household composition    | NF                       | -                          | NF                         | -                          |
| Household type           | -                        | -                          | Normal                     | -                          |
| <u>Mother and father</u> |                          |                            |                            |                            |
| Place of birth           | Cam                      | Cam                        | Cam                        | -                          |
| Previous residence       | -                        | -                          | Cam                        | -                          |
| Mother tongue            | Kh                       | Kh                         | Kh                         | -                          |
| Religion                 | Budd                     | Budd                       | Budd                       | -                          |
| <u>Children</u>          |                          |                            |                            |                            |
| Place of birth           | -                        | -                          | Cam                        | -                          |
| Previous residence       | -                        | -                          | Cam                        | -                          |
| Mother tongue            | Kh                       | -                          | Kh                         | -                          |
| Religion                 | Budd                     | -                          | Budd                       | -                          |
| Marital status           | NM                       | -                          | NM                         | -                          |

*Notes:* NF – nuclear family; Cam – Cambodia; Kh – Khmer; Budd. – Buddhism; NM – never married. “-” means that no restriction is imposed. The detailed procedures for constructing FET Sample III are reported in Appendix Table A8. Fisher’s exact tests based on FET Samples III, III-A, and III-B (with three subsamples) are conducted for each subsample and Fisher’s exact tests based on FET Sample III-C (without subsamples) are not.

Table A10: Relationships between Locations of Killing Sites and Pre-treatment Village/Parental Characteristics for Alternative Samples

| Variable                                                       | Sample III-A        |                   |                   | Sample III-B      |                   |                   | Sample III-C      |                   |                   |
|----------------------------------------------------------------|---------------------|-------------------|-------------------|-------------------|-------------------|-------------------|-------------------|-------------------|-------------------|
|                                                                | 1977-79<br>(1)      | 1980<br>(2)       | 1981-82<br>(3)    | 1977-79<br>(4)    | 1980<br>(5)       | 1981-82<br>(6)    | 1977-79<br>(7)    | 1980<br>(8)       | 1981-82<br>(9)    |
| A. Village characteristics                                     |                     |                   |                   |                   |                   |                   |                   |                   |                   |
| Distance to major roads (km)                                   | -0.014<br>(0.013)   | -0.006<br>(0.012) | -0.009<br>(0.010) | -0.011<br>(0.012) | -0.003<br>(0.011) | -0.004<br>(0.009) | -0.024<br>(0.020) | -0.009<br>(0.017) | -0.009<br>(0.016) |
| Prop. of non-migrant women<br>aged 36-50 with grade 1-5        | 0.045<br>(0.118)    | 0.145<br>(0.115)  | 0.033<br>(0.092)  | 0.070<br>(0.114)  | 0.182<br>(0.111)  | 0.056<br>(0.087)  | 0.044<br>(0.171)  | 0.198<br>(0.170)  | 0.151<br>(0.129)  |
| Prop. of non-migrant women<br>aged 36-50 with grade 6 or above | 0.256<br>(0.176)    | 0.309*<br>(0.162) | 0.251*<br>(0.135) | 0.165<br>(0.178)  | 0.276<br>(0.173)  | 0.142<br>(0.138)  | -0.022<br>(0.288) | 0.228<br>(0.260)  | 0.239<br>(0.192)  |
| Observations                                                   | 834                 | 895               | 1,128             | 892               | 951               | 1,207             | 440               | 470               | 592               |
| Num. of spatially balanced clusters                            | 108                 | 108               | 108               | 122               | 122               | 122               | 60                | 60                | 60                |
| R-squared                                                      | 0.464               | 0.450             | 0.434             | 0.472             | 0.428             | 0.434             | 0.495             | 0.467             | 0.466             |
| p-value of the listed variables                                | 0.292               | 0.172             | 0.169             | 0.506             | 0.173             | 0.610             | 0.595             | 0.442             | 0.254             |
| B. Parental characteristics                                    |                     |                   |                   |                   |                   |                   |                   |                   |                   |
| Mother's age                                                   | 0.000<br>(0.004)    | -0.003<br>(0.004) | -0.004<br>(0.003) | -0.001<br>(0.004) | -0.003<br>(0.004) | -0.004<br>(0.003) | -0.001<br>(0.005) | -0.001<br>(0.006) | -0.004<br>(0.004) |
| Father's age                                                   | -0.005**<br>(0.002) | 0.002<br>(0.002)  | 0.000<br>(0.002)  | -0.002<br>(0.002) | 0.003<br>(0.003)  | 0.001<br>(0.002)  | 0.000<br>(0.003)  | 0.000<br>(0.003)  | 0.005*<br>(0.003) |
| Mother with grade 1-5                                          | 0.044**<br>(0.022)  | 0.018<br>(0.021)  | 0.004<br>(0.016)  | 0.041*<br>(0.021) | 0.024<br>(0.022)  | 0.020<br>(0.015)  | 0.046<br>(0.031)  | 0.05<br>(0.031)   | 0.022<br>(0.022)  |
| Mother with grade 6 or above                                   | 0.082**<br>(0.034)  | -0.021<br>(0.034) | 0.047*<br>(0.027) | 0.057*<br>(0.033) | -0.028<br>(0.034) | -0.003<br>(0.029) | 0.089*<br>(0.052) | -0.008<br>(0.047) | 0.034<br>(0.037)  |
| Father with grade 1-5                                          | -0.007<br>(0.026)   | -0.008<br>(0.029) | 0.032*<br>(0.017) | -0.009<br>(0.026) | 0.004<br>(0.028)  | 0.008<br>(0.018)  | 0.012<br>(0.036)  | -0.032<br>(0.039) | 0.045*<br>(0.024) |
| Father with grade 6 or above                                   | 0.002<br>(0.029)    | 0.043<br>(0.031)  | 0.037<br>(0.023)  | 0.009<br>(0.028)  | 0.030<br>(0.030)  | 0.007<br>(0.023)  | 0.003<br>(0.037)  | 0.010<br>(0.040)  | 0.031<br>(0.031)  |
| Observations                                                   | 2,125               | 2,224             | 4,138             | 2,273             | 2,307             | 4,286             | 1,135             | 1,120             | 2,088             |
| Num. of spatially balanced clusters                            | 108                 | 108               | 108               | 122               | 122               | 122               | 60                | 60                | 60                |
| R-squared                                                      | 0.481               | 0.472             | 0.440             | 0.470             | 0.451             | 0.438             | 0.496             | 0.486             | 0.487             |
| p-value of the listed variables                                | 0.014               | 0.298             | 0.165             | 0.267             | 0.402             | 0.564             | 0.600             | 0.622             | 0.156             |

Notes: The table reports OLS estimates where the unit of observation is the village in panel A and the household in panel B. The dependent variable is an indicator variable equal to 1 if villages are located within 3.0 km of killing sites and 0 otherwise. All regressions also include zone and district fixed effects and spatial cluster fixed effects.  $p$ -values are from  $F$ -tests for the joint significance of the listed variables. Robust standard errors are reported in parentheses in panel A and robust standard errors, adjusted for clustering by village, are reported in parentheses in panel B. \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent level.

Table A11: Characteristics of Killing Sites with Spatially Balanced Clusters and Information about Victims

| Variable                                                       | Killing site:<br>Dependent variable: | Killing sites used for F.E. tests |                            |                              | Killing sites with<br>spatially balanced clusters<br>(S.B.C) |                              |
|----------------------------------------------------------------|--------------------------------------|-----------------------------------|----------------------------|------------------------------|--------------------------------------------------------------|------------------------------|
|                                                                |                                      | Have<br>S.B.C.<br>(1)             | Have<br>Vict. Info.<br>(2) | ln (Num.<br>of Vict.)<br>(3) | Have<br>Vict. Info.<br>(4)                                   | ln (Num.<br>of Vict.)<br>(5) |
| Distance to major roads (km)                                   |                                      | 0.007***<br>(0.003)               | 0.003<br>(0.003)           | -0.027**<br>(0.013)          | -0.004<br>(0.005)                                            | -0.044*<br>(0.023)           |
| Prop. of non-migrant women aged<br>36-50 with grade 1-5        |                                      | 0.084<br>(0.137)                  | 0.146<br>(0.148)           | 1.080<br>(0.753)             | -0.350<br>(0.265)                                            | 1.735<br>(1.185)             |
| Prop. of non-migrant women aged<br>36-50 with grade 6 or above |                                      | -0.347<br>(0.221)                 | -0.598**<br>(0.266)        | 1.511<br>(1.355)             | -0.455<br>(0.595)                                            | -2.373<br>(2.228)            |
| Zone fixed effects                                             |                                      | Yes                               | Yes                        | Yes                          | Yes                                                          | Yes                          |
| Observations                                                   |                                      | 408                               | 408                        | 274                          | 111                                                          | 80                           |
| Num. of dep. variables (= 1)                                   |                                      | 111                               | 274                        | -                            | 80                                                           | -                            |
| R-squared                                                      |                                      | 0.068                             | 0.049                      | 0.100                        | 0.110                                                        | 0.173                        |
| p-value of the listed variables                                |                                      | 0.003                             | 0.029                      | 0.014                        | 0.363                                                        | 0.081                        |

*Notes:* The table reports OLS estimates where the unit of observation is the killing site. Out of 433 killing sites in columns 1-2 and 115 killing sites in column 4, 25 and 4 sites, respectively, are excluded because of a lack of information about the educational levels of non-migrant women aged 36-50 around the sites; 274 and 80 killing sites with information about victims are analyzed in columns 3 and 5, respectively. The dependent variable in column 1 is an indicator variable equal to 1 if killing sites have spatially balanced clusters and 0 otherwise. The dependent variable in columns 2 and 4 is an indicator variable equal to 1 if killing sites have information about victims and 0 otherwise. The dependent variable in columns 3 and 5 is the logarithmic value of the lower bound of the number of victims at each killing site. The education levels of non-migrant women aged 36-50 are the ones of non-migrant women aged 36-50 living in villages within 3.0 km of each killing site. Robust standard errors are reported in parentheses. *p*-values are from *F*-tests for the joint significance of the three listed variables. \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent.

Table A12: Difference in Mean Characteristics between Households Living within 3.0 km of Killing Sites and Those not within 3.0 km of Killing Sites

| A. Households with their first child born in 1977-1979 |                                                                     |                   |                      |                                                                     |                   |                      |                                                                     |                   |                      |
|--------------------------------------------------------|---------------------------------------------------------------------|-------------------|----------------------|---------------------------------------------------------------------|-------------------|----------------------|---------------------------------------------------------------------|-------------------|----------------------|
| Sample:                                                | Sample I                                                            |                   |                      | Sample II                                                           |                   |                      | Sample III                                                          |                   |                      |
|                                                        | <div>&lt; 3 km of K.S. (1)    ≥ 3 km of K.S. (2)    diff. (3)</div> |                   |                      | <div>&lt; 3 km of K.S. (4)    ≥ 3 km of K.S. (5)    diff. (6)</div> |                   |                      | <div>&lt; 3 km of K.S. (7)    ≥ 3 km of K.S. (8)    diff. (9)</div> |                   |                      |
| A-1. Parental characteristics                          |                                                                     |                   |                      |                                                                     |                   |                      |                                                                     |                   |                      |
| Mother's age                                           | 40.602<br>(2.692)                                                   | 40.593<br>(2.722) | 0.009<br>(0.059)     | 40.548<br>(2.713)                                                   | 40.579<br>(2.720) | -0.030<br>(0.072)    | 40.625<br>(2.670)                                                   | 40.666<br>(2.666) | -0.041<br>(0.116)    |
| Father's age                                           | 44.016<br>(4.491)                                                   | 44.019<br>(4.660) | -0.003<br>(0.100)    | 43.916<br>(4.482)                                                   | 44.004<br>(4.535) | -0.087<br>(0.120)    | 44.131<br>(4.576)                                                   | 44.226<br>(4.477) | -0.096<br>(0.197)    |
| Mother without any grade                               | 0.339<br>(0.474)                                                    | 0.428<br>(0.495)  | -0.089***<br>(0.011) | 0.340<br>(0.474)                                                    | 0.391<br>(0.488)  | -0.050***<br>(0.013) | 0.315<br>(0.465)                                                    | 0.398<br>(0.490)  | -0.083***<br>(0.021) |
| Mother with grade 1-5                                  | 0.527<br>(0.499)                                                    | 0.470<br>(0.499)  | 0.057***<br>(0.011)  | 0.529<br>(0.499)                                                    | 0.499<br>(0.500)  | 0.030**<br>(0.013)   | 0.562<br>(0.496)                                                    | 0.482<br>(0.500)  | 0.080***<br>(0.022)  |
| Mother with grade 6 or above                           | 0.134<br>(0.340)                                                    | 0.102<br>(0.303)  | 0.032***<br>(0.007)  | 0.131<br>(0.337)                                                    | 0.110<br>(0.313)  | 0.021**<br>(0.009)   | 0.123<br>(0.329)                                                    | 0.119<br>(0.324)  | 0.004<br>(0.014)     |
| Father without any grade                               | 0.156<br>(0.363)                                                    | 0.209<br>(0.407)  | -0.053***<br>(0.009) | 0.160<br>(0.366)                                                    | 0.177<br>(0.382)  | -0.017*<br>(0.010)   | 0.156<br>(0.363)                                                    | 0.165<br>(0.371)  | -0.008<br>(0.016)    |
| Father with grade 1-5                                  | 0.512<br>(0.500)                                                    | 0.512<br>(0.500)  | 0.000<br>(0.011)     | 0.511<br>(0.500)                                                    | 0.529<br>(0.499)  | -0.017<br>(0.013)    | 0.508<br>(0.500)                                                    | 0.507<br>(0.500)  | 0.001<br>(0.022)     |
| Father with grade 6 or above                           | 0.332<br>(0.471)                                                    | 0.279<br>(0.448)  | 0.054***<br>(0.010)  | 0.329<br>(0.470)                                                    | 0.295<br>(0.456)  | 0.034***<br>(0.012)  | 0.336<br>(0.472)                                                    | 0.328<br>(0.470)  | 0.007<br>(0.020)     |
| Observations                                           | 2,886                                                               | 8,255             |                      | 2,632                                                               | 3,106             |                      | 965                                                                 | 1,172             |                      |
| A-2. Children's educational outcomes                   |                                                                     |                   |                      |                                                                     |                   |                      |                                                                     |                   |                      |
| A-2-1. Age 15-21                                       |                                                                     |                   |                      |                                                                     |                   |                      |                                                                     |                   |                      |
| No schooling                                           | 0.152<br>(0.312)                                                    | 0.231<br>(0.372)  | -0.079***<br>(0.008) | 0.156<br>(0.316)                                                    | 0.192<br>(0.343)  | -0.036***<br>(0.009) | 0.176<br>(0.330)                                                    | 0.190<br>(0.340)  | -0.014<br>(0.015)    |
| Primary school completion                              | 0.396<br>(0.416)                                                    | 0.299<br>(0.387)  | 0.097***<br>(0.009)  | 0.390<br>(0.415)                                                    | 0.329<br>(0.399)  | 0.062***<br>(0.011)  | 0.352<br>(0.409)                                                    | 0.355<br>(0.407)  | -0.003<br>(0.018)    |
| Years of schooling                                     | 4.826<br>(2.754)                                                    | 4.038<br>(2.728)  | 0.788***<br>(0.059)  | 4.780<br>(2.758)                                                    | 4.343<br>(2.675)  | 0.437***<br>(0.072)  | 4.512<br>(2.759)                                                    | 4.515<br>(2.711)  | -0.003<br>(0.119)    |
| Observations                                           | 2,886                                                               | 8,255             |                      | 2,632                                                               | 3,106             |                      | 965                                                                 | 1,172             |                      |
| A-2-2. Age 6-14                                        |                                                                     |                   |                      |                                                                     |                   |                      |                                                                     |                   |                      |
| No schooling                                           | 0.288<br>(0.351)                                                    | 0.366<br>(0.387)  | -0.078***<br>(0.008) | 0.291<br>(0.353)                                                    | 0.323<br>(0.370)  | -0.032***<br>(0.010) | 0.308<br>(0.364)                                                    | 0.314<br>(0.373)  | -0.007<br>(0.016)    |
| School attendance                                      | 0.695<br>(0.360)                                                    | 0.618<br>(0.390)  | 0.077***<br>(0.009)  | 0.692<br>(0.363)                                                    | 0.659<br>(0.376)  | 0.033***<br>(0.010)  | 0.671<br>(0.376)                                                    | 0.665<br>(0.380)  | 0.005<br>(0.017)     |
| Grade progression                                      | -3.473<br>(1.428)                                                   | -3.712<br>(1.492) | 0.240***<br>(0.033)  | -3.480<br>(1.441)                                                   | -3.588<br>(1.493) | 0.108***<br>(0.040)  | -3.556<br>(1.429)                                                   | -3.547<br>(1.509) | -0.009<br>(0.066)    |
| Observations                                           | 2,697                                                               | 7,823             |                      | 2,460                                                               | 2,942             |                      | 908                                                                 | 1,119             |                      |
| Continue                                               |                                                                     |                   |                      |                                                                     |                   |                      |                                                                     |                   |                      |

*Continue*

Table A12: Difference in Mean Characteristics between Households Living within 3.0 km of Killing Sites and Those not within 3.0 km of Killing Sites

| Sample:                              | B. Households with their first child born in 1980 |                          |                      |                               |                          |                      |                          |                          |                      |
|--------------------------------------|---------------------------------------------------|--------------------------|----------------------|-------------------------------|--------------------------|----------------------|--------------------------|--------------------------|----------------------|
|                                      | Sample I                                          |                          |                      | Sample II                     |                          |                      | Sample III               |                          |                      |
|                                      | (All spatial clusters)                            |                          |                      | (Spatially balanced clusters) |                          |                      |                          |                          |                      |
| Variable                             | < 3 km<br>of K.S.<br>(1)                          | ≥ 3 km<br>of K.S.<br>(2) | diff.<br>(3)         | < 3 km<br>of K.S.<br>(4)      | ≥ 3 km<br>of K.S.<br>(5) | diff.<br>(6)         | < 3 km<br>of K.S.<br>(7) | ≥ 3 km<br>of K.S.<br>(8) | diff.<br>(9)         |
| B-1. Parental characteristics        |                                                   |                          |                      |                               |                          |                      |                          |                          |                      |
| Mother's age                         | 39.351<br>(2.750)                                 | 39.388<br>(2.725)        | -0.037<br>(0.062)    | 39.323<br>(2.741)             | 39.406<br>(2.709)        | -0.083<br>(0.074)    | 39.286<br>(2.795)        | 39.486<br>(2.684)        | -0.200*<br>(0.119)   |
| Father's age                         | 42.236<br>(4.400)                                 | 42.139<br>(4.398)        | 0.097<br>(0.099)     | 42.155<br>(4.352)             | 42.143<br>(4.374)        | 0.012<br>(0.119)     | 42.196<br>(4.198)        | 42.297<br>(4.334)        | -0.101<br>(0.186)    |
| Mother without any grade             | 0.357<br>(0.479)                                  | 0.438<br>(0.496)         | -0.080***<br>(0.011) | 0.360<br>(0.480)              | 0.405<br>(0.491)         | -0.046***<br>(0.013) | 0.372<br>(0.484)         | 0.400<br>(0.490)         | -0.028<br>(0.021)    |
| Mother with grade 1-5                | 0.533<br>(0.499)                                  | 0.475<br>(0.499)         | 0.058***<br>(0.011)  | 0.535<br>(0.499)              | 0.498<br>(0.500)         | 0.037***<br>(0.014)  | 0.544<br>(0.498)         | 0.489<br>(0.500)         | 0.055**<br>(0.022)   |
| Mother with grade 6 or above         | 0.110<br>(0.313)                                  | 0.088<br>(0.283)         | 0.022***<br>(0.007)  | 0.105<br>(0.306)              | 0.097<br>(0.295)         | 0.008<br>(0.008)     | 0.084<br>(0.277)         | 0.111<br>(0.314)         | -0.027***<br>(0.013) |
| Father without any grade             | 0.176<br>(0.381)                                  | 0.218<br>(0.413)         | -0.042***<br>(0.009) | 0.183<br>(0.387)              | 0.190<br>(0.393)         | -0.007<br>(0.011)    | 0.186<br>(0.390)         | 0.186<br>(0.389)         | 0.000<br>(0.017)     |
| Father with grade 1-5                | 0.531<br>(0.499)                                  | 0.536<br>(0.499)         | -0.004<br>(0.011)    | 0.530<br>(0.499)              | 0.548<br>(0.498)         | -0.019<br>(0.014)    | 0.531<br>(0.499)         | 0.533<br>(0.499)         | -0.001<br>(0.022)    |
| Father with grade 6 or above         | 0.292<br>(0.455)                                  | 0.247<br>(0.431)         | 0.046***<br>(0.010)  | 0.287<br>(0.453)              | 0.261<br>(0.439)         | 0.026**<br>(0.012)   | 0.283<br>(0.450)         | 0.281<br>(0.450)         | 0.001<br>(0.020)     |
| Observations                         | 2,602                                             | 8,040                    |                      | 2,398                         | 3,076                    |                      | 945                      | 1,209                    |                      |
| B-2. Children's educational outcomes |                                                   |                          |                      |                               |                          |                      |                          |                          |                      |
| B-2-1. Age 15-18                     |                                                   |                          |                      |                               |                          |                      |                          |                          |                      |
| No schooling                         | 0.149<br>(0.324)                                  | 0.212<br>(0.370)         | -0.063***<br>(0.008) | 0.154<br>(0.328)              | 0.177<br>(0.343)         | -0.023**<br>(0.009)  | 0.164<br>(0.335)         | 0.184<br>(0.351)         | -0.021<br>(0.015)    |
| Primary school completion            | 0.410<br>(0.438)                                  | 0.330<br>(0.415)         | 0.080***<br>(0.009)  | 0.405<br>(0.437)              | 0.362<br>(0.428)         | 0.043***<br>(0.012)  | 0.383<br>(0.433)         | 0.375<br>(0.428)         | 0.008<br>(0.019)     |
| Years of schooling                   | 4.904<br>(2.852)                                  | 4.218<br>(2.791)         | 0.687***<br>(0.063)  | 4.863<br>(2.865)              | 4.527<br>(2.775)         | 0.336***<br>(0.077)  | 4.669<br>(2.822)         | 4.610<br>(2.848)         | 0.059<br>(0.123)     |
| Observations                         | 2,602                                             | 8,040                    |                      | 2,398                         | 3,076                    |                      | 945                      | 1,209                    |                      |
| B-2-2. Age 6-14                      |                                                   |                          |                      |                               |                          |                      |                          |                          |                      |
| No schooling                         | 0.281<br>(0.342)                                  | 0.349<br>(0.371)         | -0.068***<br>(0.008) | 0.286<br>(0.346)              | 0.312<br>(0.353)         | -0.025***<br>(0.010) | 0.290<br>(0.352)         | 0.306<br>(0.361)         | -0.015<br>(0.016)    |
| School attendance                    | 0.702<br>(0.347)                                  | 0.635<br>(0.374)         | 0.067***<br>(0.008)  | 0.698<br>(0.351)              | 0.672<br>(0.359)         | 0.026***<br>(0.010)  | 0.691<br>(0.356)         | 0.677<br>(0.364)         | 0.013<br>(0.016)     |
| Grade progression                    | -3.430<br>(1.422)                                 | -3.656<br>(1.442)        | 0.226***<br>(0.033)  | -3.450<br>(1.421)             | -3.554<br>(1.430)        | 0.104***<br>(0.040)  | -3.482<br>(1.367)        | -3.565<br>(1.450)        | 0.083<br>(0.063)     |
| Observations                         | 2,490                                             | 7,695                    |                      | 2,294                         | 2,952                    |                      | 909                      | 1,159                    |                      |

*Continue*

Table A12: Difference in Mean Characteristics between Households Living within 3.0 km of Killing Sites and Those not within 3.0 km of Killing Sites

| C. Households with their first child born in 1981-1982 |                          |                          |                      |                          |                          |                      |                          |                          |                      |
|--------------------------------------------------------|--------------------------|--------------------------|----------------------|--------------------------|--------------------------|----------------------|--------------------------|--------------------------|----------------------|
| Variable                                               | Sample I                 |                          |                      | Sample II                |                          |                      | Sample III               |                          |                      |
|                                                        | < 3 km<br>of K.S.<br>(1) | ≥ 3 km<br>of K.S.<br>(2) | diff.<br>(3)         | < 3 km<br>of K.S.<br>(4) | ≥ 3 km<br>of K.S.<br>(5) | diff.<br>(6)         | < 3 km<br>of K.S.<br>(7) | ≥ 3 km<br>of K.S.<br>(8) | diff.<br>(9)         |
| C-1. Parental characteristics                          |                          |                          |                      |                          |                          |                      |                          |                          |                      |
| Mother's age                                           | 38.293<br>(2.837)        | 38.257<br>(2.865)        | 0.037<br>(0.048)     | 38.266<br>(2.831)        | 38.216<br>(2.857)        | 0.049<br>(0.058)     | 38.090<br>(2.813)        | 38.219<br>(2.843)        | -0.130<br>(0.090)    |
| Father's age                                           | 40.887<br>(4.506)        | 40.765<br>(4.607)        | 0.122<br>(0.077)     | 40.862<br>(4.517)        | 40.733<br>(4.579)        | 0.130<br>(0.093)     | 40.738<br>(4.484)        | 40.738<br>(4.456)        | 0.000<br>(0.142)     |
| Mother without any grade                               | 0.396<br>(0.489)         | 0.471<br>(0.499)         | -0.076***<br>(0.008) | 0.400<br>(0.490)         | 0.435<br>(0.496)         | -0.035***<br>(0.010) | 0.390<br>(0.488)         | 0.439<br>(0.496)         | -0.049***<br>(0.016) |
| Mother with grade 1-5                                  | 0.515<br>(0.500)         | 0.465<br>(0.499)         | 0.049***<br>(0.008)  | 0.515<br>(0.500)         | 0.496<br>(0.500)         | 0.019*<br>(0.010)    | 0.535<br>(0.499)         | 0.478<br>(0.500)         | 0.056***<br>(0.016)  |
| Mother with grade 6 or above                           | 0.090<br>(0.286)         | 0.064<br>(0.244)         | 0.026***<br>(0.004)  | 0.085<br>(0.279)         | 0.069<br>(0.254)         | 0.015***<br>(0.005)  | 0.075<br>(0.264)         | 0.082<br>(0.275)         | -0.007<br>(0.009)    |
| Father without any grade                               | 0.207<br>(0.405)         | 0.264<br>(0.441)         | -0.057***<br>(0.007) | 0.208<br>(0.406)         | 0.227<br>(0.419)         | -0.018**<br>(0.008)  | 0.223<br>(0.416)         | 0.227<br>(0.419)         | -0.004<br>(0.013)    |
| Father with grade 1-5                                  | 0.552<br>(0.497)         | 0.544<br>(0.498)         | 0.008<br>(0.008)     | 0.558<br>(0.497)         | 0.563<br>(0.496)         | -0.005<br>(0.010)    | 0.559<br>(0.497)         | 0.539<br>(0.499)         | 0.020<br>(0.016)     |
| Father with grade 6 or above                           | 0.241<br>(0.428)         | 0.192<br>(0.394)         | 0.049***<br>(0.007)  | 0.234<br>(0.423)         | 0.210<br>(0.407)         | 0.024***<br>(0.008)  | 0.218<br>(0.413)         | 0.234<br>(0.424)         | -0.016<br>(0.013)    |
| Observations                                           | 4,654                    | 14,617                   |                      | 4,316                    | 5,428                    |                      | 1,764                    | 2,247                    |                      |
| C-2. Children's educational outcomes                   |                          |                          |                      |                          |                          |                      |                          |                          |                      |
| C-2-1. Age 15-17                                       |                          |                          |                      |                          |                          |                      |                          |                          |                      |
| No schooling                                           | 0.152<br>(0.347)         | 0.214<br>(0.396)         | -0.061***<br>(0.006) | 0.156<br>(0.351)         | 0.172<br>(0.363)         | -0.016**<br>(0.007)  | 0.179<br>(0.371)         | 0.170<br>(0.361)         | 0.009<br>(0.012)     |
| Primary school completion                              | 0.411<br>(0.472)         | 0.308<br>(0.441)         | 0.103***<br>(0.008)  | 0.404<br>(0.471)         | 0.341<br>(0.452)         | 0.063***<br>(0.009)  | 0.371<br>(0.462)         | 0.353<br>(0.457)         | 0.018<br>(0.015)     |
| Years of schooling                                     | 4.831<br>(2.935)         | 4.075<br>(2.832)         | 0.756***<br>(0.048)  | 4.775<br>(2.940)         | 4.403<br>(2.808)         | 0.372***<br>(0.058)  | 4.572<br>(2.937)         | 4.530<br>(2.868)         | 0.042<br>(0.092)     |
| Observations                                           | 4,654                    | 14,617                   |                      | 4,316                    | 5,428                    |                      | 1,764                    | 2,247                    |                      |
| C-2-2. Age 6-14                                        |                          |                          |                      |                          |                          |                      |                          |                          |                      |
| No schooling                                           | 0.287<br>(0.342)         | 0.360<br>(0.370)         | -0.073***<br>(0.006) | 0.292<br>(0.345)         | 0.315<br>(0.349)         | -0.023***<br>(0.007) | 0.288<br>(0.346)         | 0.305<br>(0.346)         | -0.016<br>(0.011)    |
| School attendance                                      | 0.696<br>(0.349)         | 0.622<br>(0.374)         | 0.074***<br>(0.006)  | 0.691<br>(0.352)         | 0.667<br>(0.353)         | 0.024***<br>(0.007)  | 0.692<br>(0.353)         | 0.676<br>(0.352)         | 0.017<br>(0.011)     |
| Grade progression                                      | -3.362<br>(1.427)        | -3.637<br>(1.412)        | 0.274***<br>(0.024)  | -3.380<br>(1.423)        | -3.488<br>(1.386)        | 0.109***<br>(0.029)  | -3.364<br>(1.395)        | -3.441<br>(1.385)        | 0.077*<br>(0.045)    |
| Observations                                           | 4,476                    | 14,185                   |                      | 4,149                    | 5,267                    |                      | 1,705                    | 2,195                    |                      |

Notes: The unit of observation is the household. Standard deviations are reported in parentheses in columns 1, 2, 4, 5, 7, and 8. Standard errors of differences in means are reported in parentheses in columns 3, 6, and 9.  $p$ -values for the difference in the means are based on two-sided unpaired  $t$ -tests.



Table A13: Difference in Mean Characteristics between Villages within 3.0 km of Killing Sites and Those not within 3.0 km of Killing Sites

| Sample:                                                        | Sample I                 |                          |                      | Sample II                |                          |                      | Sample III               |                          |                      |
|----------------------------------------------------------------|--------------------------|--------------------------|----------------------|--------------------------|--------------------------|----------------------|--------------------------|--------------------------|----------------------|
|                                                                | < 3 km<br>of K.S.<br>(1) | ≥ 3 km<br>of K.S.<br>(2) | diff.<br>(3)         | < 3 km<br>of K.S.<br>(4) | ≥ 3 km<br>of K.S.<br>(5) | diff.<br>(6)         | < 3 km<br>of K.S.<br>(7) | ≥ 3 km<br>of K.S.<br>(8) | diff.<br>(9)         |
| Variable                                                       |                          |                          |                      |                          |                          |                      |                          |                          |                      |
| A. Households with their first child born in 1977-1979         |                          |                          |                      |                          |                          |                      |                          |                          |                      |
| Distance to major roads (km)                                   | 8.153<br>(8.852)         | 9.041<br>(9.421)         | -0.889**<br>(0.345)  | 8.390<br>(9.035)         | 8.527<br>(9.482)         | -0.137<br>(0.420)    | 8.766<br>(10.023)        | 8.732<br>(9.746)         | 0.034<br>(0.684)     |
| Prop. of non-migrant women<br>aged 36-50 without any grade     | 0.417<br>(0.218)         | 0.494<br>(0.226)         | -0.077***<br>(0.008) | 0.422<br>(0.217)         | 0.469<br>(0.221)         | -0.047***<br>(0.010) | 0.425<br>(0.224)         | 0.475<br>(0.226)         | -0.049***<br>(0.016) |
| Prop. of non-migrant women<br>aged 36-50 with grade 1-5        | 0.454<br>(0.195)         | 0.411<br>(0.208)         | 0.043***<br>(0.008)  | 0.453<br>(0.197)         | 0.434<br>(0.203)         | 0.020**<br>(0.009)   | 0.456<br>(0.210)         | 0.422<br>(0.204)         | 0.035**<br>(0.014)   |
| Prop. of non-migrant women<br>aged 36-50 with grade 6 or above | 0.129<br>(0.127)         | 0.095<br>(0.109)         | 0.034***<br>(0.004)  | 0.125<br>(0.125)         | 0.097<br>(0.105)         | 0.028***<br>(0.005)  | 0.118<br>(0.131)         | 0.104<br>(0.107)         | 0.014*<br>(0.008)    |
| Observations                                                   | 953                      | 3,036                    |                      | 879                      | 1,100                    |                      | 390                      | 449                      |                      |
| B. Households with their first child born in 1980              |                          |                          |                      |                          |                          |                      |                          |                          |                      |
| Distance to major roads (km)                                   | 8.277<br>(8.931)         | 8.775<br>(9.249)         | -0.499<br>(0.337)    | 8.519<br>(9.098)         | 8.346<br>(9.338)         | 0.173<br>(0.408)     | 9.183<br>(9.975)         | 8.602<br>(9.477)         | 0.581<br>(0.655)     |
| Prop. of non-migrant women<br>aged 36-50 without any grade     | 0.407<br>(0.216)         | 0.491<br>(0.226)         | -0.085***<br>(0.008) | 0.412<br>(0.215)         | 0.468<br>(0.222)         | -0.057***<br>(0.010) | 0.416<br>(0.224)         | 0.474<br>(0.225)         | -0.058***<br>(0.015) |
| Prop. of non-migrant women<br>aged 36-50 with grade 1-5        | 0.464<br>(0.197)         | 0.412<br>(0.207)         | 0.052***<br>(0.008)  | 0.463<br>(0.199)         | 0.429<br>(0.203)         | 0.034***<br>(0.009)  | 0.464<br>(0.213)         | 0.416<br>(0.203)         | 0.048***<br>(0.014)  |
| Prop. of non-migrant women<br>aged 36-50 with grade 6 or above | 0.130<br>(0.124)         | 0.097<br>(0.114)         | 0.033***<br>(0.004)  | 0.125<br>(0.123)         | 0.103<br>(0.113)         | 0.022***<br>(0.005)  | 0.120<br>(0.124)         | 0.110<br>(0.118)         | 0.010<br>(0.008)     |
| Observations                                                   | 964                      | 3,190                    |                      | 895                      | 1,203                    |                      | 397                      | 492                      |                      |
| C. Households with their first child born in 1981-1982         |                          |                          |                      |                          |                          |                      |                          |                          |                      |
| Distance to major roads (km)                                   | 8.160<br>(8.851)         | 8.843<br>(9.136)         | -0.683**<br>(0.299)  | 8.411<br>(9.016)         | 8.430<br>(9.205)         | -0.019<br>(0.363)    | 8.813<br>(9.896)         | 8.732<br>(9.746)         | 0.394<br>(0.569)     |
| Prop. of non-migrant women<br>aged 36-50 without any grade     | 0.432<br>(0.223)         | 0.497<br>(0.230)         | -0.066***<br>(0.008) | 0.437<br>(0.222)         | 0.470<br>(0.221)         | -0.033***<br>(0.009) | 0.440<br>(0.228)         | 0.475<br>(0.226)         | -0.032**<br>(0.013)  |
| Prop. of non-migrant women<br>aged 36-50 with grade 1-5        | 0.445<br>(0.201)         | 0.409<br>(0.211)         | 0.035***<br>(0.007)  | 0.444<br>(0.203)         | 0.430<br>(0.206)         | 0.013*<br>(0.008)    | 0.446<br>(0.215)         | 0.422<br>(0.204)         | 0.024*<br>(0.012)    |
| Prop. of non-migrant women<br>aged 36-50 with grade 6 or above | 0.124<br>(0.124)         | 0.094<br>(0.113)         | 0.030***<br>(0.004)  | 0.119<br>(0.121)         | 0.099<br>(0.112)         | 0.020***<br>(0.005)  | 0.115<br>(0.121)         | 0.104<br>(0.107)         | 0.008<br>(0.007)     |
| Observations                                                   | 1,195                    | 4,002                    |                      | 1,107                    | 1,470                    |                      | 503                      | 625                      |                      |

Notes: The unit of observation is the village. Standard deviations are reported in parentheses in columns 1, 2, 4, 5, 7, and 8. Standard errors of differences in means are reported in parentheses in columns 3, 6, and 9. *p*-values for the difference in the means are based on two-sided unpaired *t*-tests.

Table A14: Difference in Number of Children across Subsamples

| Variable                                           | Sample:<br>Dependent variable: | Sample III                 | Sample IV                  |
|----------------------------------------------------|--------------------------------|----------------------------|----------------------------|
|                                                    |                                | Num. of<br>children<br>(1) | Num. of<br>children<br>(2) |
| HH with first child born in 1977-79                |                                | 0.642***<br>(0.050)        | 0.626***<br>(0.071)        |
| HH with first child born in 1980                   |                                | 0.359***<br>(0.042)        | 0.315***<br>(0.057)        |
| Parental characteristics                           |                                | Yes                        | Yes                        |
| Zone, district, and spatial cluster fixed effects  |                                | Yes                        | Yes                        |
| Observations                                       |                                | 8,302                      | 3,821                      |
| Observations (HH with first child born in 1977-79) |                                | 2,137                      | 1,008                      |
| Observations (HH with first child born in 1980)    |                                | 2,154                      | 1,015                      |
| R-squared                                          |                                | 0.107                      | 0.121                      |
| <i>p</i> -value of the two listed variables        |                                | 0.000                      | 0.000                      |

*Notes:* The table reports OLS estimates where the unit of observation is the household. The dependent variable is the number of children in households. “HH with first child born in 1977-1979 (1980)” is an indicator variable equal to 1 if households had their first child born in 1977-1979 (1980) and 0 otherwise (“HH with first child born in 1981-1982” is excluded as the base case). Parental characteristics include the mother’s and father’s age and education. Robust standard errors, adjusted for clustering by village, are reported in parentheses. *p*-values are from *F*-tests for the joint significance of the two listed variables. \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent level.

Table A15: Impacts of Genocide on Other Post-treatment Variables

| Subsample:            | 1977-79                                        | 1980              | 1981-82           | 1977-79                                   | 1980               | 1981-82              | 1977-79                                          | 1980             | 1981-82           |
|-----------------------|------------------------------------------------|-------------------|-------------------|-------------------------------------------|--------------------|----------------------|--------------------------------------------------|------------------|-------------------|
|                       | (1)                                            | (2)               | (3)               | (4)                                       | (5)                | (6)                  | (7)                                              | (8)              | (9)               |
|                       | A-1. Married                                   |                   |                   | A-2. Divorced                             |                    |                      | A-3. Widowed                                     |                  |                   |
| Genocidal Violence I  | 0.004<br>(0.012)                               | -0.017<br>(0.011) | -0.004<br>(0.008) | -0.002<br>(0.007)                         | 0.003<br>(0.007)   | 0.004<br>(0.005)     | -0.006<br>(0.010)                                | 0.013<br>(0.009) | 0.004<br>(0.007)  |
| Observations          | 5,299                                          | 5,441             | 10,197            | 5,299                                     | 5,441              | 10,197               | 4,359                                            | 4,539            | 8,492             |
| Mean ( $\geq 3.0$ km) | 0.858                                          | 0.883             | 0.888             | 0.042                                     | 0.043              | 0.043                | 0.082                                            | 0.059            | 0.053             |
| R-squared             | 0.074                                          | 0.070             | 0.039             | 0.057                                     | 0.052              | 0.031                | 0.077                                            | 0.076            | 0.039             |
|                       | A-4. Migrant households                        |                   |                   | A-5. Num. of children<br>aged 15-21/18/17 |                    |                      | A-6. Male children<br>aged 15-21/18/17           |                  |                   |
| Genocidal Violence I  | 0.007<br>(0.024)                               | -0.002<br>(0.021) | 0.005<br>(0.017)  | -0.020<br>(0.041)                         | 0.063**<br>(0.028) | 0.040*<br>(0.021)    | -0.009<br>(0.023)                                | 0.033<br>(0.025) | 0.008<br>(0.021)  |
| Observations          | 4,543                                          | 4,780             | 9,030             | 2,137                                     | 2,154              | 4,011                | 2,137                                            | 2,154            | 4,011             |
| Mean ( $\geq 3.0$ km) | 0.582                                          | 0.592             | 0.596             | 2.243                                     | 1.810              | 1.316                | 0.758                                            | 0.685            | 0.585             |
| R-squared             | 0.232                                          | 0.243             | 0.225             | 0.122                                     | 0.110              | 0.073                | 0.126                                            | 0.095            | 0.064             |
|                       | A-7. Num. of male<br>children aged 15-21/18/17 |                   |                   | A-8. Female children<br>aged 15-21/18/17  |                    |                      | A-9. Num. of female<br>children aged 15-21/18/17 |                  |                   |
| Genocidal Violence I  | -0.033<br>(0.047)                              | 0.059<br>(0.039)  | 0.020<br>(0.026)  | 0.000<br>(0.022)                          | 0.002<br>(0.026)   | 0.000<br>(0.019)     | 0.012<br>(0.043)                                 | 0.004<br>(0.040) | 0.021<br>(0.026)  |
| Observations          | 2,137                                          | 2,154             | 4,011             | 2,137                                     | 2,154              | 4,011                | 2,137                                            | 2,154            | 4,011             |
| Mean ( $\geq 3.0$ km) | 1.142                                          | 0.897             | 0.668             | 0.750                                     | 0.699              | 0.572                | 1.102                                            | 0.912            | 0.648             |
| R-squared             | 0.120                                          | 0.094             | 0.065             | 0.099                                     | 0.107              | 0.060                | 0.104                                            | 0.103            | 0.062             |
|                       | A-10. Children aged 6-14                       |                   |                   | A-11. Num. of children<br>aged 6-14       |                    |                      | A-12. Male children<br>aged 6-14                 |                  |                   |
| Genocidal Violence I  | -0.021<br>(0.016)                              | 0.003<br>(0.009)  | -0.006<br>(0.007) | 0.005<br>(0.069)                          | -0.056<br>(0.064)  | -0.164***<br>(0.046) | 0.020<br>(0.024)                                 | 0.004<br>(0.026) | -0.012<br>(0.016) |
| Observations          | 2,137                                          | 2,154             | 4,011             | 2,137                                     | 2,154              | 4,011                | 2,137                                            | 2,154            | 4,011             |
| Mean ( $\geq 3.0$ km) | 0.955                                          | 0.959             | 0.977             | 2.448                                     | 2.640              | 2.806                | 0.750                                            | 0.768            | 0.796             |
| R-squared             | 0.107                                          | 0.099             | 0.070             | 0.126                                     | 0.127              | 0.101                | 0.117                                            | 0.099            | 0.064             |

*Continue*

Table A15: Impacts of Genocide on Other Post-treatment Variables

| Subsample:            | 1977-79                                  | 1980              | 1981-82           | 1977-79                                      | 1980               | 1981-82             | 1977-79                                      | 1980              | 1981-82             |
|-----------------------|------------------------------------------|-------------------|-------------------|----------------------------------------------|--------------------|---------------------|----------------------------------------------|-------------------|---------------------|
|                       | (1)                                      | (2)               | (3)               | (4)                                          | (5)                | (6)                 | (7)                                          | (8)               | (9)                 |
|                       | A-13. Num. of male<br>children aged 6-14 |                   |                   | A-14. Female children<br>aged 6-14           |                    |                     | A-15. Num. of female<br>children aged 6-14   |                   |                     |
| Genocidal Violence I  | 0.062<br>(0.055)                         | -0.016<br>(0.058) | -0.060<br>(0.041) | -0.041<br>(0.027)                            | 0.014<br>(0.022)   | -0.029*<br>(0.017)  | -0.057<br>(0.060)                            | -0.040<br>(0.052) | -0.103**<br>(0.043) |
| Observations          | 2,137                                    | 2,154             | 4,011             | 2,137                                        | 2,154              | 4,011               | 2,137                                        | 2,154             | 4,011               |
| Mean ( $\geq 3.0$ km) | 1.236                                    | 1.344             | 1.385             | 0.742                                        | 0.764              | 0.815               | 1.212                                        | 1.296             | 1.421               |
| R-squared             | 0.120                                    | 0.113             | 0.070             | 0.117                                        | 0.114              | 0.064               | 0.123                                        | 0.122             | 0.072               |
|                       | A-16. Children aged<br>younger than 6    |                   |                   | A-17. Grandmother                            |                    |                     | A-18 Grandfather                             |                   |                     |
| Genocidal Violence I  | -0.033<br>(0.028)                        | 0.025<br>(0.028)  | -0.010<br>(0.021) | -0.012<br>(0.012)                            | 0.000<br>(0.012)   | 0.023***<br>(0.009) | 0.008<br>(0.007)                             | 0.002<br>(0.007)  | 0.001<br>(0.005)    |
| Observations          | 2,137                                    | 2,154             | 4,011             | 2,137                                        | 2,154              | 4,011               | 2,137                                        | 2,154             | 4,011               |
| Mean ( $\geq 3.0$ km) | 0.573                                    | 0.576             | 0.658             | 0.038                                        | 0.046              | 0.039               | 0.011                                        | 0.017             | 0.015               |
| R-squared             | 0.161                                    | 0.182             | 0.122             | 0.114                                        | 0.091              | 0.065               | 0.169                                        | 0.107             | 0.061               |
|                       | A-19. Num. of male<br>children born      |                   |                   | A-20. Num. of female<br>children born        |                    |                     | A-21. HH with<br>child death                 |                   |                     |
| Genocidal Violence I  | -0.056<br>(0.095)                        | 0.053<br>(0.091)  | -0.005<br>(0.063) | -0.119<br>(0.095)                            | -0.080<br>(0.089)  | -0.059<br>(0.071)   | -0.073**<br>(0.031)                          | -0.020<br>(0.030) | 0.025<br>(0.021)    |
| Observations          | 2,137                                    | 2,154             | 4,011             | 2,137                                        | 2,154              | 4,011               | 2,137                                        | 2,154             | 4,011               |
| Mean ( $\geq 3.0$ km) | 3.184                                    | 3.036             | 2.880             | 3.032                                        | 2.935              | 2.838               | 0.386                                        | 0.369             | 0.366               |
| R-squared             | 0.143                                    | 0.131             | 0.078             | 0.133                                        | 0.150              | 0.097               | 0.120                                        | 0.151             | 0.095               |
|                       | A-22. Female head                        |                   |                   | A-23. Mother working<br>in a non-farm sector |                    |                     | A-24. Father working<br>in a non-farm sector |                   |                     |
| Genocidal Violence I  | -0.013<br>(0.012)                        | -0.012<br>(0.015) | 0.001<br>(0.011)  | 0.010<br>(0.015)                             | 0.026**<br>(0.012) | 0.020<br>(0.013)    | 0.028<br>(0.024)                             | 0.026<br>(0.022)  | 0.042**<br>(0.017)  |
| Observations          | 2,137                                    | 2,154             | 4,011             | 2,137                                        | 2,154              | 4,011               | 2,137                                        | 2,154             | 4,011               |
| Mean ( $\geq 3.0$ km) | 0.047                                    | 0.044             | 0.039             | 0.055                                        | 0.038              | 0.059               | 0.127                                        | 0.117             | 0.109               |
| R-squared             | 0.202                                    | 0.189             | 0.107             | 0.207                                        | 0.167              | 0.245               | 0.248                                        | 0.248             | 0.213               |

*Continue*



Table A16: Relationships between Continuous Genocide Measure and Pre-treatment Village/Parental Characteristics across Subsamples for Alternative Samples

| Variable                                                       | 4.0 km              |                    |                    | 6.0 km              |                   |                    | 8.0 km             |                   |                    |
|----------------------------------------------------------------|---------------------|--------------------|--------------------|---------------------|-------------------|--------------------|--------------------|-------------------|--------------------|
|                                                                | 1977-79<br>(1)      | 1981-82<br>(2)     | 1981-82<br>(3)     | 1977-79<br>(4)      | 1981-82<br>(5)    | 1981-82<br>(6)     | 1977-79<br>(7)     | 1981-82<br>(8)    | 1981-82<br>(9)     |
| A. Village characteristics                                     |                     |                    |                    |                     |                   |                    |                    |                   |                    |
| Distance to major roads (km)                                   | -0.021<br>(0.029)   | -0.024<br>(0.029)  | -0.024<br>(0.024)  | -0.044<br>(0.030)   | -0.022<br>(0.032) | -0.043*<br>(0.026) | -0.027<br>(0.017)  | -0.049<br>(0.030) | -0.043*<br>(0.025) |
| Prop. of non-migrant women<br>aged 36-50 with grade 1-5        | 0.470<br>(0.334)    | 0.493*<br>(0.296)  | 0.370<br>(0.245)   | -0.285<br>(0.288)   | -0.103<br>(0.262) | -0.082<br>(0.186)  | 0.422<br>(0.287)   | 0.586<br>(0.379)  | 0.337<br>(0.267)   |
| Prop. of non-migrant women<br>aged 36-50 with grade 6 or above | 0.872**<br>(0.413)  | 0.650*<br>(0.384)  | 0.558*<br>(0.337)  | 0.649<br>(0.412)    | 0.455<br>(0.461)  | 0.304<br>(0.322)   | 0.109<br>(0.400)   | 0.550<br>(0.400)  | 0.078<br>(0.342)   |
| Observations                                                   | 383                 | 391                | 482                | 376                 | 403               | 512                | 340                | 357               | 452                |
| Num. of spatially balanced clusters                            | 190                 | 190                | 190                | 115                 | 115               | 115                | 60                 | 60                | 60                 |
| R-squared                                                      | 0.882               | 0.883              | 0.883              | 0.892               | 0.893             | 0.899              | 0.877              | 0.854             | 0.858              |
| p-value of the listed variables                                | 0.076               | 0.102              | 0.153              | 0.105               | 0.599             | 0.115              | 0.240              | 0.194             | 0.370              |
| B. Parental characteristics                                    |                     |                    |                    |                     |                   |                    |                    |                   |                    |
| Mother's age                                                   | -0.028**<br>(0.012) | -0.001<br>(0.011)  | 0.005<br>(0.006)   | -0.009<br>(0.008)   | 0.007<br>(0.008)  | 0.000<br>(0.005)   | -0.006<br>(0.009)  | -0.013<br>(0.011) | -0.008<br>(0.007)  |
| Father's age                                                   | 0.007<br>(0.007)    | -0.003<br>(0.008)  | -0.007*<br>(0.004) | -0.010**<br>(0.005) | -0.004<br>(0.005) | -0.001<br>(0.004)  | -0.002<br>(0.005)  | 0.002<br>(0.008)  | 0.004<br>(0.005)   |
| Mother with grade 1-5                                          | 0.034<br>(0.061)    | 0.115**<br>(0.057) | 0.071**<br>(0.035) | 0.032<br>(0.038)    | -0.031<br>(0.045) | -0.023<br>(0.027)  | -0.002<br>(0.048)  | -0.001<br>(0.067) | 0.034<br>(0.055)   |
| Mother with grade 6 or above                                   | 0.048<br>(0.099)    | 0.003<br>(0.091)   | 0.102<br>(0.068)   | 0.064<br>(0.065)    | -0.088<br>(0.087) | -0.042<br>(0.049)  | -0.123*<br>(0.069) | -0.016<br>(0.106) | -0.074<br>(0.074)  |
| Father with grade 1-5                                          | 0.145<br>(0.111)    | -0.096<br>(0.075)  | 0.013<br>(0.043)   | -0.062<br>(0.047)   | -0.008<br>(0.054) | -0.031<br>(0.034)  | -0.033<br>(0.056)  | 0.058<br>(0.105)  | 0.025<br>(0.044)   |
| Father with grade 6 or above                                   | 0.143<br>(0.095)    | -0.104<br>(0.076)  | 0.013<br>(0.052)   | -0.022<br>(0.055)   | -0.016<br>(0.064) | 0.015<br>(0.044)   | 0.017<br>(0.059)   | 0.157*<br>(0.081) | 0.087*<br>(0.048)  |
| Observations                                                   | 1,067               | 1,014              | 1,792              | 1,008               | 1,015             | 1,798              | 924                | 888               | 1,541              |
| Num. of spatially balanced clusters                            | 190                 | 190                | 190                | 115                 | 115               | 115                | 60                 | 60                | 60                 |
| R-squared                                                      | 0.845               | 0.870              | 0.890              | 0.902               | 0.892             | 0.896              | 0.874              | 0.812             | 0.839              |
| p-value of the listed variables                                | 0.257               | 0.341              | 0.161              | 0.003               | 0.919             | 0.764              | 0.532              | 0.466             | 0.381              |

Notes: The table reports OLS estimates where the unit of observation is the village in panel A and the household in panel B. The dependent variable is the logarithmic value of the continuous genocide measure based on the first-order polynomial in distance (ln (Genocidal Violence II)). All regressions control for zone and district fixed effects and spatial cluster fixed effects.  $p$ -values are from  $F$ -tests for the joint significance of the listed variables. Robust standard errors are reported in parentheses in panel A and robust standard errors, adjusted for clustering by village, are reported in parentheses in panel B. \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent level.

Table A17: Robustness Check – Alternative Samples

| Subsample:                         | 1977-79                                   | 1980              | 1981-82           | 1977-79                   | 1980                | 1981-82            | 1977-79              | 1980                | 1981-82           |
|------------------------------------|-------------------------------------------|-------------------|-------------------|---------------------------|---------------------|--------------------|----------------------|---------------------|-------------------|
|                                    | (1)                                       | (2)               | (3)               | (4)                       | (5)                 | (6)                | (7)                  | (8)                 | (9)               |
| Cohort:                            | A. Children aged 15-21/18/17              |                   |                   |                           |                     |                    |                      |                     |                   |
| Dependent variable:                | No schooling                              |                   |                   | Primary school completion |                     |                    | Years of schooling   |                     |                   |
|                                    | A-1-1. Sample III-A: Genocidal Violence I |                   |                   |                           |                     |                    |                      |                     |                   |
| Baseline specification             | 0.033<br>(0.021)                          | -0.024<br>(0.022) | -0.005<br>(0.015) | -0.027<br>(0.024)         | -0.013<br>(0.023)   | 0.021<br>(0.018)   | -0.340**<br>(0.154)  | -0.045<br>(0.152)   | 0.023<br>(0.115)  |
| R-squared                          | 0.354                                     | 0.324             | 0.265             | 0.336                     | 0.326               | 0.238              | 0.430                | 0.394               | 0.351             |
| Specification IV                   | 0.034*<br>(0.020)                         | -0.021<br>(0.021) | -0.010<br>(0.015) | -0.026<br>(0.023)         | -0.012<br>(0.023)   | 0.042**<br>(0.017) | -0.332**<br>(0.147)  | -0.037<br>(0.149)   | 0.143<br>(0.104)  |
| R-squared                          | 0.384                                     | 0.349             | 0.285             | 0.398                     | 0.406               | 0.308              | 0.491                | 0.475               | 0.423             |
| Mean ( $\geq 3.0$ km)              | 0.203                                     | 0.192             | 0.180             | 0.341                     | 0.372               | 0.338              | 4.384                | 4.563               | 4.420             |
| Observations                       | 2,125                                     | 2,224             | 4,138             | 2,125                     | 2,224               | 4,138              | 2,125                | 2,224               | 4,138             |
| Observations ( $< 3.0$ km of K.S.) | 939                                       | 985               | 1,853             | 939                       | 985                 | 1,853              | 939                  | 985                 | 1,853             |
|                                    | A-1-2. Sample III-B: Genocidal Violence I |                   |                   |                           |                     |                    |                      |                     |                   |
| Baseline specification             | 0.031*<br>(0.018)                         | -0.004<br>(0.020) | -0.004<br>(0.014) | -0.020<br>(0.023)         | -0.014<br>(0.023)   | 0.016<br>(0.018)   | -0.324**<br>(0.141)  | -0.196<br>(0.148)   | 0.035<br>(0.111)  |
| R-squared                          | 0.388                                     | 0.353             | 0.269             | 0.326                     | 0.315               | 0.233              | 0.447                | 0.399               | 0.346             |
| Specification IV                   | 0.039**<br>(0.018)                        | 0.002<br>(0.019)  | -0.004<br>(0.014) | -0.035<br>(0.022)         | -0.022<br>(0.023)   | 0.006<br>(0.017)   | -0.422***<br>(0.136) | -0.256*<br>(0.144)  | -0.029<br>(0.102) |
| R-squared                          | 0.410                                     | 0.372             | 0.290             | 0.388                     | 0.378               | 0.305              | 0.504                | 0.465               | 0.422             |
| Mean ( $\geq 3.0$ km)              | 0.188                                     | 0.179             | 0.167             | 0.353                     | 0.374               | 0.354              | 4.515                | 4.636               | 4.549             |
| Observations                       | 2,273                                     | 2,307             | 4,286             | 2,273                     | 2,307               | 4,286              | 2,273                | 2,307               | 4,286             |
| Observations ( $< 3.0$ km of K.S.) | 1,039                                     | 1,023             | 1,905             | 1,039                     | 1,023               | 1,905              | 1,039                | 1,023               | 1,905             |
|                                    | A-1-3. Sample III-C: Genocidal Violence I |                   |                   |                           |                     |                    |                      |                     |                   |
| Baseline specification             | 0.068**<br>(0.029)                        | 0.010<br>(0.027)  | 0.009<br>(0.022)  | 0.007<br>(0.033)          | -0.073**<br>(0.033) | -0.008<br>(0.028)  | -0.290<br>(0.222)    | -0.448**<br>(0.224) | -0.168<br>(0.176) |
| R-squared                          | 0.374                                     | 0.377             | 0.293             | 0.335                     | 0.359               | 0.247              | 0.437                | 0.438               | 0.377             |
| Specification IV                   | 0.081***<br>(0.029)                       | 0.015<br>(0.029)  | 0.010<br>(0.022)  | -0.002<br>(0.032)         | -0.068**<br>(0.031) | -0.008<br>(0.027)  | -0.407*<br>(0.212)   | -0.412*<br>(0.215)  | -0.197<br>(0.167) |
| R-squared                          | 0.423                                     | 0.410             | 0.328             | 0.414                     | 0.441               | 0.329              | 0.509                | 0.526               | 0.452             |
| Mean ( $\geq 3.0$ km)              | 0.224                                     | 0.206             | 0.215             | 0.309                     | 0.363               | 0.288              | 4.160                | 4.457               | 4.063             |
| Observations                       | 1,135                                     | 1,120             | 2,088             | 1,135                     | 1,120               | 2,088              | 1,135                | 1,120               | 2,088             |
| Observations ( $< 3.0$ km of K.S.) | 535                                       | 517               | 989               | 535                       | 517                 | 989                | 535                  | 517                 | 989               |
| <i>Continue</i>                    |                                           |                   |                   |                           |                     |                    |                      |                     |                   |

*Continue*

Table A17: Robustness Check – Alternative Samples

| Subsample:                         | 1977-79<br>(1)                                 | 1980<br>(2)          | 1981-82<br>(3)       | 1977-79<br>(4)            | 1980<br>(5)         | 1981-82<br>(6)     | 1977-79<br>(7)         | 1980<br>(8)         | 1981-82<br>(9)      |
|------------------------------------|------------------------------------------------|----------------------|----------------------|---------------------------|---------------------|--------------------|------------------------|---------------------|---------------------|
| Cohort:                            | A. Children aged 15-21/18/17                   |                      |                      |                           |                     |                    |                        |                     |                     |
| Dependent variable:                | No schooling                                   |                      |                      | Primary school completion |                     |                    | Years of schooling     |                     |                     |
|                                    | A-2-1. Sample IV-A: ln (Genocidal Violence II) |                      |                      |                           |                     |                    |                        |                     |                     |
| Baseline specification             | 0.0165<br>(0.0245)                             | -0.0114<br>(0.0219)  | -0.0057<br>(0.0168)  | -0.0275<br>(0.0177)       | 0.0052<br>(0.0230)  | 0.0250<br>(0.0235) | -0.2854**<br>(0.1318)  | 0.0186<br>(0.1583)  | 0.1736<br>(0.1348)  |
| R-squared                          | 0.338                                          | 0.299                | 0.264                | 0.328                     | 0.272               | 0.197              | 0.443                  | 0.350               | 0.322               |
| Specification IV                   | 0.0216<br>(0.0253)                             | -0.0066<br>(0.0222)  | -0.0141<br>(0.0176)  | -0.0261<br>(0.0165)       | 0.0031<br>(0.0225)  | 0.0318<br>(0.0227) | -0.2923**<br>(0.1362)  | 0.0033<br>(0.1539)  | 0.2096*<br>(0.1244) |
| R-squared                          | 0.402                                          | 0.337                | 0.300                | 0.403                     | 0.380               | 0.276              | 0.513                  | 0.451               | 0.410               |
| Mean of the outcome (< 6.0 km)     | 0.248                                          | 0.233                | 0.216                | 0.297                     | 0.308               | 0.290              | 4.007                  | 4.100               | 4.016               |
| Mean of ln (Genocidal Violence II) | 6.179                                          | 6.055                | 5.901                | 6.179                     | 6.055               | 5.901              | 6.179                  | 6.055               | 5.901               |
| S.D. of ln (Genocidal Violence II) | 1.644                                          | 1.626                | 1.642                | 1.644                     | 1.626               | 1.642              | 1.644                  | 1.626               | 1.642               |
| Observations                       | 887                                            | 930                  | 1,585                | 887                       | 930                 | 1,585              | 887                    | 930                 | 1,585               |
|                                    | A-2-2. Sample IV-B: ln (Genocidal Violence II) |                      |                      |                           |                     |                    |                        |                     |                     |
| Baseline specification             | 0.0398**<br>(0.0201)                           | -0.0078<br>(0.0178)  | 0.0074<br>(0.0148)   | -0.0337*<br>(0.0174)      | 0.0168<br>(0.0226)  | 0.0164<br>(0.0209) | -0.3261**<br>(0.1267)  | 0.0597<br>(0.1380)  | 0.0680<br>(0.1115)  |
| R-squared                          | 0.368                                          | 0.333                | 0.271                | 0.294                     | 0.266               | 0.198              | 0.426                  | 0.366               | 0.327               |
| Specification IV                   | 0.0398*<br>(0.0215)                            | -0.0019<br>(0.0171)  | 0.0059<br>(0.0158)   | -0.0434**<br>(0.0173)     | 0.0118<br>(0.0206)  | 0.0139<br>(0.0202) | -0.3888***<br>(0.1335) | 0.0163<br>(0.1263)  | 0.0682<br>(0.1101)  |
| R-squared                          | 0.409                                          | 0.369                | 0.297                | 0.365                     | 0.355               | 0.273              | 0.483                  | 0.451               | 0.410               |
| Mean of the outcome (< 6.0 km)     | 0.221                                          | 0.210                | 0.193                | 0.323                     | 0.320               | 0.316              | 4.240                  | 4.230               | 4.229               |
| Mean of ln (Genocidal Violence II) | 6.032                                          | 5.884                | 5.682                | 6.032                     | 5.884               | 5.682              | 6.032                  | 5.884               | 5.682               |
| S.D. of ln (Genocidal Violence II) | 1.669                                          | 1.684                | 1.668                | 1.669                     | 1.684               | 1.668              | 1.669                  | 1.684               | 1.668               |
| Observations                       | 1,109                                          | 1,120                | 1,960                | 1,109                     | 1,120               | 1,960              | 1,109                  | 1,120               | 1,960               |
|                                    | A-2-3. Sample IV-C: ln (Genocidal Violence II) |                      |                      |                           |                     |                    |                        |                     |                     |
| Baseline specification             | 0.0609*<br>(0.0328)                            | -0.0197<br>(0.0166)  | -0.0121<br>(0.0161)  | -0.0273<br>(0.0219)       | -0.0057<br>(0.0200) | 0.0033<br>(0.0217) | -0.3799**<br>(0.1810)  | -0.0268<br>(0.1371) | -0.0005<br>(0.1236) |
| R-squared                          | 0.363                                          | 0.355                | 0.289                | 0.331                     | 0.326               | 0.224              | 0.451                  | 0.404               | 0.388               |
| Specification IV                   | 0.0759**<br>(0.0350)                           | -0.0310*<br>(0.0184) | -0.0337*<br>(0.0173) | -0.0477**<br>(0.0227)     | 0.0090<br>(0.0202)  | 0.0158<br>(0.0222) | -0.5945***<br>(0.1890) | 0.0568<br>(0.1339)  | 0.0771<br>(0.1237)  |
| R-squared                          | 0.455                                          | 0.417                | 0.351                | 0.436                     | 0.455               | 0.330              | 0.533                  | 0.519               | 0.488               |
| Mean of the outcome (< 6.0 km)     | 0.294                                          | 0.264                | 0.251                | 0.287                     | 0.297               | 0.251              | 3.792                  | 3.949               | 3.772               |
| Mean of ln (Genocidal Violence II) | 6.382                                          | 6.219                | 6.240                | 6.382                     | 6.219               | 6.240              | 6.382                  | 6.219               | 6.240               |
| S.D. of ln (Genocidal Violence II) | 1.587                                          | 1.726                | 1.651                | 1.587                     | 1.726               | 1.651              | 1.587                  | 1.726               | 1.651               |
| Observations                       | 525                                            | 489                  | 868                  | 525                       | 489                 | 868                | 525                    | 489                 | 868                 |

*Continue*



Table A17: Robustness Check – Alternative Samples

| Subsample:                                | 1977-79               | 1980              | 1981-82           | 1977-79                            | 1980               | 1981-82          | 1977-79             | 1980               | 1981-82           |
|-------------------------------------------|-----------------------|-------------------|-------------------|------------------------------------|--------------------|------------------|---------------------|--------------------|-------------------|
|                                           | (1)                   | (2)               | (3)               | (4)                                | (5)                | (6)              | (7)                 | (8)                | (9)               |
|                                           | B. Children aged 6-14 |                   |                   |                                    |                    |                  |                     |                    |                   |
| Outcomes on:<br>Dependent variable:       | No schooling          |                   |                   | School attendance                  |                    |                  | Grade progression   |                    |                   |
|                                           |                       |                   |                   | Sample III-A: Genocidal Violence I |                    |                  |                     |                    |                   |
| Baseline specification                    | 0.035<br>(0.022)      | 0.030<br>(0.023)  | 0.000<br>(0.016)  | -0.036<br>(0.023)                  | -0.029<br>(0.023)  | 0.005<br>(0.016) | -0.186**<br>(0.094) | 0.033<br>(0.077)   | 0.014<br>(0.056)  |
| R-squared                                 | 0.338                 | 0.307             | 0.293             | 0.327                              | 0.296              | 0.279            | 0.278               | 0.253              | 0.227             |
| Specification IV                          | 0.044**<br>(0.022)    | 0.027<br>(0.021)  | -0.010<br>(0.015) | -0.042*<br>(0.023)                 | -0.026<br>(0.021)  | 0.012<br>(0.016) | -0.141*<br>(0.078)  | -0.012<br>(0.067)  | 0.002<br>(0.047)  |
| R-squared                                 | 0.412                 | 0.390             | 0.357             | 0.393                              | 0.371              | 0.333            | 0.528               | 0.475              | 0.497             |
| Mean ( $\geq 3.0$ km)                     | 0.325                 | 0.310             | 0.311             | 0.654                              | 0.673              | 0.669            | -3.584              | -3.588             | -3.499            |
| Observations                              | 2,018                 | 2,137             | 4,023             | 2,018                              | 2,137              | 4,023            | 2,018               | 2,137              | 4,023             |
| Observations ( $< 3.0$ km of K.S.)        | 887                   | 944               | 1,800             | 887                                | 944                | 1,800            | 887                 | 944                | 1,800             |
| B-1-2. Sample III-B: Genocidal Violence I |                       |                   |                   |                                    |                    |                  |                     |                    |                   |
| Baseline specification                    | 0.023<br>(0.020)      | 0.036*<br>(0.021) | -0.006<br>(0.014) | -0.022<br>(0.021)                  | -0.036*<br>(0.021) | 0.014<br>(0.014) | -0.112<br>(0.089)   | -0.015<br>(0.071)  | 0.007<br>(0.051)  |
| R-squared                                 | 0.347                 | 0.315             | 0.301             | 0.338                              | 0.300              | 0.289            | 0.283               | 0.257              | 0.229             |
| Specification IV                          | 0.035*<br>(0.021)     | 0.034*<br>(0.019) | -0.007<br>(0.013) | -0.033<br>(0.021)                  | -0.034*<br>(0.019) | 0.014<br>(0.014) | -0.158**<br>(0.075) | -0.102*<br>(0.062) | -0.030<br>(0.045) |
| R-squared                                 | 0.419                 | 0.390             | 0.366             | 0.399                              | 0.369              | 0.346            | 0.536               | 0.480              | 0.485             |
| Mean ( $\geq 3.0$ km)                     | 0.317                 | 0.306             | 0.304             | 0.662                              | 0.677              | 0.676            | -3.558              | -3.555             | -3.432            |
| Observations                              | 2,149                 | 2,215             | 4,167             | 2,149                              | 2,215              | 4,167            | 2,149               | 2,215              | 4,167             |
| Observations ( $< 3.0$ km of K.S.)        | 974                   | 985               | 1,844             | 974                                | 985                | 1,844            | 974                 | 985                | 1,844             |
| B-1-3. Sample III-C: Genocidal Violence I |                       |                   |                   |                                    |                    |                  |                     |                    |                   |
| Baseline specification                    | 0.028<br>(0.032)      | 0.027<br>(0.033)  | -0.002<br>(0.022) | -0.022<br>(0.033)                  | -0.044<br>(0.032)  | 0.005<br>(0.021) | -0.161<br>(0.127)   | 0.004<br>(0.116)   | -0.086<br>(0.085) |
| R-squared                                 | 0.342                 | 0.335             | 0.340             | 0.330                              | 0.324              | 0.336            | 0.252               | 0.300              | 0.230             |
| Specification IV                          | 0.039<br>(0.033)      | 0.016<br>(0.031)  | 0.000<br>(0.022)  | -0.033<br>(0.034)                  | -0.027<br>(0.031)  | 0.002<br>(0.022) | -0.170<br>(0.113)   | -0.077<br>(0.099)  | -0.073<br>(0.071) |
| R-squared                                 | 0.446                 | 0.422             | 0.403             | 0.426                              | 0.402              | 0.393            | 0.531               | 0.531              | 0.505             |
| Mean ( $\geq 3.0$ km)                     | 0.355                 | 0.349             | 0.354             | 0.627                              | 0.637              | 0.627            | -3.724              | -3.698             | -3.553            |
| Observations                              | 1,079                 | 1,075             | 2,033             | 1,079                              | 1,075              | 2,033            | 1,079               | 1,075              | 2,033             |
| Observations ( $< 3.0$ km of K.S.)        | 503                   | 494               | 957               | 503                                | 494                | 957              | 503                 | 494                | 957               |

*Continue*

Table A17: Robustness Check – Alternative Samples

| Subsample:                         | 1977-79                                        | 1980                | 1981-82             | 1977-79                | 1980                | 1981-82             | 1977-79                | 1980                 | 1981-82             |
|------------------------------------|------------------------------------------------|---------------------|---------------------|------------------------|---------------------|---------------------|------------------------|----------------------|---------------------|
|                                    | (1)                                            | (2)                 | (3)                 | (4)                    | (5)                 | (6)                 | (7)                    | (8)                  | (9)                 |
| Outcomes on:                       | B. Children aged 6-14                          |                     |                     |                        |                     |                     |                        |                      |                     |
| Dependent variable:                | No schooling                                   |                     |                     | School attendance      |                     |                     | Grade progression      |                      |                     |
|                                    | B-2-1. Sample IV-A: ln (Genocidal Violence II) |                     |                     |                        |                     |                     |                        |                      |                     |
| Baseline specification             | 0.0351<br>(0.0259)                             | -0.0068<br>(0.0241) | -0.0106<br>(0.0148) | -0.0335<br>(0.0258)    | -0.0114<br>(0.0219) | -0.0057<br>(0.0168) | -0.1987**<br>(0.0929)  | 0.0058<br>(0.0828)   | 0.0966*<br>(0.0576) |
| R-squared                          | 0.331                                          | 0.295               | 0.271               | 0.326                  | 0.299               | 0.264               | 0.243                  | 0.215                | 0.223               |
| Specification IV                   | 0.0392<br>(0.0259)                             | -0.0002<br>(0.0217) | -0.0207<br>(0.0140) | -0.0398<br>(0.0261)    | 0.0061<br>(0.0215)  | 0.0193<br>(0.0147)  | -0.1625*<br>(0.0854)   | 0.0128<br>(0.0775)   | 0.0880*<br>(0.0486) |
| R-squared                          | 0.426                                          | 0.407               | 0.358               | 0.408                  | 0.385               | 0.333               | 0.540                  | 0.472                | 0.513               |
| Mean of the outcome (< 6.0 km)     | 0.370                                          | 0.372               | 0.361               | 0.607                  | 0.609               | 0.617               | -3.725                 | -3.689               | -3.647              |
| Mean of ln (Genocidal Violence II) | 6.164                                          | 6.066               | 5.902               | 6.164                  | 6.066               | 5.902               | 6.164                  | 6.066                | 5.902               |
| S.D. of ln (Genocidal Violence II) | 1.642                                          | 1.633               | 1.643               | 1.642                  | 1.633               | 1.643               | 1.642                  | 1.633                | 1.643               |
| Observations                       | 839                                            | 894                 | 1,547               | 839                    | 894                 | 1,547               | 839                    | 894                  | 1,547               |
|                                    | B-2-2. Sample IV-B: ln (Genocidal Violence II) |                     |                     |                        |                     |                     |                        |                      |                     |
| Baseline specification             | 0.0559***<br>(0.0207)                          | -0.0005<br>(0.0204) | 0.0137<br>(0.0140)  | -0.0540**<br>(0.0214)  | 0.0064<br>(0.0208)  | -0.0134<br>(0.0144) | -0.1750**<br>(0.0792)  | 0.0175<br>(0.0706)   | 0.0611<br>(0.0511)  |
| R-squared                          | 0.349                                          | 0.294               | 0.293               | 0.348                  | 0.283               | 0.282               | 0.233                  | 0.223                | 0.218               |
| Specification IV                   | 0.0717***<br>(0.0219)                          | 0.0127<br>(0.0183)  | 0.0055<br>(0.0133)  | -0.0708***<br>(0.0224) | -0.0058<br>(0.0181) | -0.0065<br>(0.0140) | -0.2354***<br>(0.0744) | 0.0021<br>(0.0707)   | -0.0110<br>(0.0429) |
| R-squared                          | 0.433                                          | 0.388               | 0.363               | 0.416                  | 0.368               | 0.343               | 0.526                  | 0.480                | 0.488               |
| Mean of the outcome (< 6.0 km)     | 0.333                                          | 0.341               | 0.325               | 0.646                  | 0.642               | 0.655               | -3.648                 | -3.593               | -3.540              |
| Mean of ln (Genocidal Violence II) | 6.027                                          | 5.888               | 5.680               | 6.027                  | 5.888               | 5.680               | 6.027                  | 5.888                | 5.680               |
| S.D. of ln (Genocidal Violence II) | 1.68                                           | 1.690               | 1.669               | 1.68                   | 1.690               | 1.669               | 1.68                   | 1.690                | 1.669               |
| Observations                       | 1,038                                          | 1,074               | 1,908               | 1,038                  | 1,074               | 1,908               | 1,038                  | 1,074                | 1,908               |
|                                    | B-2-3. Sample IV-C: ln (Genocidal Violence II) |                     |                     |                        |                     |                     |                        |                      |                     |
| Baseline specification             | 0.0478<br>(0.0318)                             | 0.0027<br>(0.0199)  | -0.0135<br>(0.0151) | -0.0284<br>(0.0290)    | 0.0026<br>(0.0184)  | 0.0152<br>(0.0144)  | -0.2443**<br>(0.1189)  | -0.1075*<br>(0.0624) | 0.0113<br>(0.0552)  |
| R-squared                          | 0.343                                          | 0.303               | 0.295               | 0.323                  | 0.288               | 0.286               | 0.205                  | 0.278                | 0.242               |
| Specification IV                   | 0.0611*<br>(0.0353)                            | 0.0022<br>(0.0256)  | -0.0195<br>(0.0143) | -0.0454<br>(0.0323)    | 0.0045<br>(0.0230)  | 0.0200<br>(0.0140)  | -0.2138**<br>(0.0946)  | -0.0807<br>(0.0682)  | -0.0031<br>(0.0457) |
| R-squared                          | 0.468                                          | 0.411               | 0.379               | 0.446                  | 0.392               | 0.364               | 0.542                  | 0.549                | 0.538               |
| Mean of the outcome (< 6.0 km)     | 0.398                                          | 0.410               | 0.396               | 0.580                  | 0.568               | 0.584               | -3.815                 | -3.769               | -3.660              |
| Mean of ln (Genocidal Violence II) | 6.336                                          | 6.219               | 6.239               | 6.336                  | 6.219               | 6.239               | 6.336                  | 6.219                | 6.239               |
| S.D. of ln (Genocidal Violence II) | 1.594                                          | 1.734               | 1.654               | 1.594                  | 1.734               | 1.654               | 1.594                  | 1.734                | 1.654               |
| Observations                       | 495                                            | 470                 | 848                 | 495                    | 470                 | 848                 | 495                    | 470                  | 848                 |

Note: See the notes to Tables 3 and 4.

Table A18: Robustness Check – Alternative Size of Spatially Balanced Clusters (4.0 km)

| Subsample:                                 |  | 1977-79                      | 1980               | 1981-82            | 1977-79                               | 1980               | 1981-82            | 1977-79             | 1980                | 1981-82             |
|--------------------------------------------|--|------------------------------|--------------------|--------------------|---------------------------------------|--------------------|--------------------|---------------------|---------------------|---------------------|
|                                            |  | (1)                          | (2)                | (3)                | (4)                                   | (5)                | (6)                | (7)                 | (8)                 | (9)                 |
| Cohort:                                    |  | A. Children aged 15-21/18/17 |                    |                    |                                       |                    |                    |                     |                     |                     |
| Dependent variable:                        |  | No schooling                 |                    |                    | Primary school completion             |                    |                    |                     |                     |                     |
|                                            |  |                              |                    |                    | A-1. Sample III: Genocidal Violence I |                    |                    |                     |                     |                     |
| Baseline specification                     |  | 0.036**<br>(0.016)           | 0.000<br>(0.018)   | -0.007<br>(0.014)  | 0.012<br>(0.023)                      | -0.008<br>(0.025)  | 0.007<br>(0.020)   | -0.055<br>(0.133)   | -0.103<br>(0.153)   | 0.015<br>(0.117)    |
| R-squared                                  |  | 0.348                        | 0.315              | 0.251              | 0.317                                 | 0.309              | 0.233              | 0.416               | 0.386               | 0.345               |
| Specification IV                           |  | 0.034*<br>(0.018)            | 0.003<br>(0.018)   | -0.009<br>(0.014)  | -0.014<br>(0.022)                     | -0.023<br>(0.024)  | -0.010<br>(0.018)  | -0.175<br>(0.131)   | -0.173<br>(0.148)   | -0.070<br>(0.110)   |
| R-squared                                  |  | 0.375                        | 0.338              | 0.267              | 0.396                                 | 0.369              | 0.296              | 0.486               | 0.448               | 0.407               |
| Mean ( $\geq 2.0$ km)                      |  | 0.144                        | 0.146              | 0.141              | 0.365                                 | 0.409              | 0.400              | 4.691               | 4.900               | 4.835               |
| Observations                               |  | 2,294                        | 2,210              | 4,005              | 2,294                                 | 2,210              | 4,005              | 2,294               | 2,210               | 4,005               |
| Observations ( $< 2.0$ km of K.S.)         |  | 1,009                        | 976                | 1,707              | 1,009                                 | 976                | 1,707              | 1,009               | 976                 | 1,707               |
| A-2. Sample IV: ln (Genocidal Violence II) |  |                              |                    |                    |                                       |                    |                    |                     |                     |                     |
| Baseline specification                     |  | 0.0194**<br>(0.0090)         | 0.0046<br>(0.0136) | 0.0099<br>(0.0120) | 0.0035<br>(0.0147)                    | 0.0024<br>(0.0162) | 0.0089<br>(0.0209) | -0.0626<br>(0.0950) | -0.0434<br>(0.0966) | -0.0406<br>(0.1083) |
| R-squared                                  |  | 0.358                        | 0.318              | 0.237              | 0.301                                 | 0.280              | 0.223              | 0.413               | 0.355               | 0.332               |
| Specification IV                           |  | 0.0237**<br>(0.0110)         | 0.0075<br>(0.0139) | 0.0075<br>(0.0132) | -0.0057<br>(0.0154)                   | 0.0096<br>(0.0151) | 0.0064<br>(0.0210) | -0.1181<br>(0.0968) | -0.0057<br>(0.0957) | -0.0346<br>(0.1046) |
| R-squared                                  |  | 0.401                        | 0.351              | 0.263              | 0.371                                 | 0.360              | 0.289              | 0.476               | 0.428               | 0.398               |
| Mean of the outcome ( $< 4.0$ km)          |  | 0.157                        | 0.169              | 0.146              | 0.363                                 | 0.365              | 0.390              | 4.648               | 4.534               | 4.713               |
| Mean of ln (Genocidal Violence II)         |  | 6.149                        | 5.903              | 5.786              | 6.149                                 | 5.903              | 5.786              | 6.149               | 5.903               | 5.786               |
| S.D. of ln (Genocidal Violence II)         |  | 1.927                        | 1.891              | 1.812              | 1.927                                 | 1.891              | 1.812              | 1.927               | 1.891               | 1.812               |
| Observations                               |  | 1,067                        | 1,014              | 1,792              | 1,067                                 | 1,014              | 1,792              | 1,067               | 1,014               | 1,792               |

*Continue*

Table A18: Robustness Check – Alternative Size of Spatially Balanced Clusters (4.0 km)

| Subsample:                         |              | 1977-79                                    | 1980                | 1981-82            | 1977-79               | 1980               | 1981-82             | 1977-79               | 1980               | 1981-82            |
|------------------------------------|--------------|--------------------------------------------|---------------------|--------------------|-----------------------|--------------------|---------------------|-----------------------|--------------------|--------------------|
|                                    |              | (1)                                        | (2)                 | (3)                | (4)                   | (5)                | (6)                 | (7)                   | (8)                | (9)                |
| Cohort:                            |              | B. Children aged 6-14                      |                     |                    |                       |                    |                     |                       |                    |                    |
| Dependent variable:                | No schooling | School attendance                          |                     |                    |                       |                    |                     |                       |                    |                    |
|                                    |              | B-1. Sample III: Genocidal Violence I      |                     |                    |                       |                    |                     |                       |                    |                    |
| Baseline specification             |              | 0.026<br>(0.018)                           | 0.011<br>(0.018)    | -0.015<br>(0.015)  | -0.019<br>(0.019)     | -0.012<br>(0.019)  | 0.015<br>(0.015)    | -0.006<br>(0.083)     | 0.023<br>(0.073)   | 0.058<br>(0.061)   |
| R-squared                          |              | 0.314                                      | 0.287               | 0.267              | 0.302                 | 0.280              | 0.261               | 0.231                 | 0.275              | 0.222              |
| Specification IV                   |              | 0.020                                      | 0.019               | -0.016<br>(0.015)  | -0.019<br>(0.019)     | -0.020<br>(0.019)  | 0.014<br>(0.015)    | -0.082<br>(0.069)     | -0.017<br>(0.065)  | 0.010<br>(0.049)   |
| R-squared                          |              | 0.414                                      | 0.368               | 0.335              | 0.393                 | 0.357              | 0.321               | 0.493                 | 0.498              | 0.472              |
| Mean ( $\geq 2.0$ km)              |              | 0.276                                      | 0.274               | 0.286              | 0.705                 | 0.707              | 0.696               | -3.483                | -3.473             | -3.369             |
| Observations                       |              | 2,165                                      | 2,129               | 3,858              | 2,165                 | 2,129              | 3,858               | 2,165                 | 2,129              | 3,858              |
| Observations ( $< 2.0$ km of K.S.) |              | 947                                        | 933                 | 1,634              | 947                   | 933                | 1,634               | 947                   | 933                | 1,634              |
| Dependent variable:                | No schooling | B-2. Sample IV: ln (Genocidal Violence II) |                     |                    |                       |                    |                     |                       |                    |                    |
|                                    |              | B-2. Sample IV: ln (Genocidal Violence II) |                     |                    |                       |                    |                     |                       |                    |                    |
| Baseline specification             |              | 0.0303**<br>(0.0126)                       | -0.0040<br>(0.0133) | 0.0033<br>(0.0108) | -0.0308**<br>(0.0129) | 0.0112<br>(0.0139) | -0.0018<br>(0.0113) | -0.0334<br>(0.0445)   | 0.0329<br>(0.0441) | 0.0436<br>(0.0492) |
| R-squared                          |              | 0.328                                      | 0.298               | 0.283              | 0.323                 | 0.287              | 0.275               | 0.220                 | 0.280              | 0.223              |
| Specification IV                   |              | 0.0292**<br>(0.0132)                       | -0.0132<br>(0.0127) | 0.0016<br>(0.0109) | -0.0307**<br>(0.0137) | 0.0201<br>(0.0132) | -0.0022<br>(0.0115) | -0.1032**<br>(0.0460) | 0.0370<br>(0.0402) | 0.0157<br>(0.0390) |
| R-squared                          |              | 0.432                                      | 0.390               | 0.355              | 0.416                 | 0.377              | 0.340               | 0.513                 | 0.537              | 0.486              |
| Mean of the outcome ( $< 4.0$ km)  |              | 0.267                                      | 0.298               | 0.281              | 0.720                 | 0.685              | 0.699               | -3.455                | -3.505             | -3.372             |
| Mean of ln (Genocidal Violence II) |              | 6.153                                      | 5.894               | 5.785              | 6.153                 | 5.894              | 5.785               | 6.153                 | 5.894              | 5.785              |
| S.D. of ln (Genocidal Violence II) |              | 1.931                                      | 1.900               | 1.804              | 1.931                 | 1.900              | 1.804               | 1.931                 | 1.900              | 1.804              |
| Observations                       |              | 1,001                                      | 982                 | 1,738              | 1,001                 | 982                | 1,738               | 1,001                 | 982                | 1,738              |

Note: See the notes to Tables 3 and 4.

Table A19: Robustness Check – Alternative Size of Spatially Balanced Clusters (8.0 km)

| Subsample:                         |  | 1977-79                                    | 1980                | 1981-82             | 1977-79                               | 1980                | 1981-82             | 1977-79             | 1980                | 1981-82            |
|------------------------------------|--|--------------------------------------------|---------------------|---------------------|---------------------------------------|---------------------|---------------------|---------------------|---------------------|--------------------|
|                                    |  | (1)                                        | (2)                 | (3)                 | (4)                                   | (5)                 | (6)                 | (7)                 | (8)                 | (9)                |
| Cohort:                            |  | A. Children aged 15-21/18/17               |                     |                     |                                       |                     |                     |                     |                     |                    |
| Dependent variable:                |  | No schooling                               |                     |                     | Primary school completion             |                     |                     |                     |                     |                    |
|                                    |  |                                            |                     |                     | A-1. Sample III: Genocidal Violence I |                     |                     |                     |                     |                    |
| Baseline specification             |  | -0.001<br>(0.023)                          | -0.020<br>(0.021)   | 0.024<br>(0.018)    | -0.004<br>(0.024)                     | 0.070***<br>(0.025) | 0.022<br>(0.021)    | -0.094<br>(0.167)   | 0.428**<br>(0.171)  | 0.052<br>(0.129)   |
| R-squared                          |  | 0.333                                      | 0.329               | 0.257               | 0.297                                 | 0.289               | 0.224               | 0.395               | 0.373               | 0.336              |
| Specification IV                   |  | 0.002<br>(0.023)                           | -0.020<br>(0.022)   | 0.029<br>(0.018)    | -0.016<br>(0.021)                     | 0.059**<br>(0.024)  | 0.008<br>(0.020)    | -0.171<br>(0.153)   | 0.349**<br>(0.168)  | -0.054<br>(0.120)  |
| R-squared                          |  | 0.363                                      | 0.352               | 0.285               | 0.366                                 | 0.359               | 0.285               | 0.454               | 0.438               | 0.408              |
| Mean ( $\geq 4.0$ km)              |  | 0.240                                      | 0.208               | 0.204               | 0.311                                 | 0.318               | 0.306               | 4.084               | 4.179               | 4.128              |
| Observations                       |  | 1,914                                      | 1,914               | 3,511               | 1,914                                 | 1,914               | 3,511               | 1,914               | 1,914               | 3,511              |
| Observations ( $< 4.0$ km of K.S.) |  | 969                                        | 968                 | 1,839               | 969                                   | 968                 | 1,839               | 969                 | 968                 | 1,839              |
|                                    |  | A-2. Sample IV: ln (Genocidal Violence II) |                     |                     |                                       |                     |                     |                     |                     |                    |
| Baseline specification             |  | 0.0005<br>(0.0214)                         | -0.0083<br>(0.0157) | -0.0140<br>(0.0168) | -0.0063<br>(0.0179)                   | -0.0092<br>(0.0186) | -0.0027<br>(0.0205) | -0.0131<br>(0.1369) | -0.0144<br>(0.1078) | 0.0253<br>(0.1181) |
| R-squared                          |  | 0.270                                      | 0.281               | 0.231               | 0.241                                 | 0.190               | 0.167               | 0.346               | 0.289               | 0.291              |
| Specification IV                   |  | 0.0142<br>(0.0221)                         | -0.0091<br>(0.0157) | -0.0139<br>(0.0169) | -0.0139<br>(0.0177)                   | -0.0113<br>(0.0175) | -0.0036<br>(0.0191) | -0.0630<br>(0.1327) | -0.0210<br>(0.1040) | 0.0113<br>(0.1148) |
| R-squared                          |  | 0.320                                      | 0.321               | 0.268               | 0.323                                 | 0.292               | 0.254               | 0.421               | 0.387               | 0.381              |
| Mean of the outcome ( $< 8.0$ km)  |  | 0.247                                      | 0.221               | 0.229               | 0.298                                 | 0.294               | 0.282               | 3.958               | 4.020               | 3.908              |
| Mean of ln (Genocidal Violence II) |  | 6.047                                      | 5.934               | 5.712               | 6.047                                 | 5.934               | 5.712               | 6.047               | 5.934               | 5.712              |
| S.D. of ln (Genocidal Violence II) |  | 1.715                                      | 1.736               | 1.748               | 1.715                                 | 1.736               | 1.748               | 1.715               | 1.736               | 1.748              |
| Observations                       |  | 924                                        | 888                 | 1,541               | 924                                   | 888                 | 1,541               | 924                 | 888                 | 1,541              |

*Continue*

Table A19: Robustness Check – Alternative Size of Spatially Balanced Clusters (8.0 km)

| Subsample:                         | 1977-79                                    | 1980                | 1981-82             | 1977-79             | 1980               | 1981-82            | 1977-79              | 1980                | 1981-82             |
|------------------------------------|--------------------------------------------|---------------------|---------------------|---------------------|--------------------|--------------------|----------------------|---------------------|---------------------|
|                                    | (1)                                        | (2)                 | (3)                 | (4)                 | (5)                | (6)                | (7)                  | (8)                 | (9)                 |
| Cohort:                            | B. Children aged 6-14                      |                     |                     |                     |                    |                    |                      |                     |                     |
| Dependent variable:                | No schooling                               |                     |                     | School attendance   |                    |                    | Grade progression    |                     |                     |
|                                    | B-1. Sample III: Genocidal Violence I      |                     |                     |                     |                    |                    |                      |                     |                     |
| Baseline specification             | 0.030<br>(0.024)                           | 0.008<br>(0.025)    | 0.021<br>(0.018)    | -0.030<br>(0.024)   | -0.004<br>(0.024)  | -0.021<br>(0.018)  | -0.038<br>(0.098)    | -0.019<br>(0.091)   | -0.008<br>(0.067)   |
| R-squared                          | 0.303                                      | 0.291               | 0.290               | 0.292               | 0.278              | 0.273              | 0.223                | 0.233               | 0.198               |
| Specification IV                   | 0.039<br>(0.024)                           | 0.012<br>(0.024)    | 0.026<br>(0.018)    | -0.038<br>(0.024)   | -0.007<br>(0.023)  | -0.027<br>(0.018)  | -0.091<br>(0.079)    | -0.023<br>(0.084)   | -0.089<br>(0.059)   |
| R-squared                          | 0.378                                      | 0.356               | 0.356               | 0.359               | 0.338              | 0.334              | 0.522                | 0.471               | 0.480               |
| Mean ( $\geq 4.0$ km)              | 0.347                                      | 0.329               | 0.343               | 0.631               | 0.652              | 0.638              | -3.739               | -3.691              | -3.625              |
| Observations                       | 1,827                                      | 1,830               | 3,407               | 1,827               | 1,830              | 3,407              | 1,827                | 1,830               | 3,407               |
| Observations ( $< 4.0$ km of K.S.) | 929                                        | 926                 | 1,785               | 929                 | 926                | 1,785              | 929                  | 926                 | 1,785               |
|                                    | B-2. Sample IV: ln (Genocidal Violence II) |                     |                     |                     |                    |                    |                      |                     |                     |
| Baseline specification             | 0.0264<br>(0.0195)                         | -0.0122<br>(0.0165) | -0.0102<br>(0.0159) | -0.0218<br>(0.0196) | 0.0124<br>(0.0170) | 0.0093<br>(0.0161) | -0.0765<br>(0.0837)  | -0.0343<br>(0.0545) | -0.008<br>(0.0433)  |
| R-squared                          | 0.251                                      | 0.230               | 0.239               | 0.233               | 0.226              | 0.218              | 0.179                | 0.152               | 0.165               |
| Specification IV                   | 0.0295<br>(0.0201)                         | -0.0137<br>(0.0156) | -0.0078<br>(0.0144) | -0.0227<br>(0.0203) | 0.0153<br>(0.0162) | 0.0070<br>(0.0151) | -0.1126*<br>(0.0647) | -0.0162<br>(0.0531) | -0.0162<br>(0.0409) |
| R-squared                          | 0.341                                      | 0.331               | 0.320               | 0.310               | 0.313              | 0.292              | 0.508                | 0.472               | 0.502               |
| Mean of the outcome ( $< 8.0$ km)  | 0.381                                      | 0.378               | 0.374               | 0.596               | 0.602              | 0.604              | -3.759               | -3.731              | -3.682              |
| Mean of ln (Genocidal Violence II) | 6.042                                      | 5.941               | 5.708               | 6.042               | 5.941              | 5.708              | 6.042                | 5.941               | 5.708               |
| S.D. of ln (Genocidal Violence II) | 1.716                                      | 1.740               | 1.747               | 1.716               | 1.740              | 1.747              | 1.716                | 1.740               | 1.747               |
| Observations                       | 874                                        | 848                 | 1,500               | 874                 | 848                | 1,500              | 874                  | 848                 | 1,500               |

Note: See the notes to Tables 3 and 4.

Table A20: Relationships between Locations of Killing Sites and Pre-treatment Village/Parental Characteristics across Sub-samples for Alternative Samples

| Size of spatially balanced clusters                            |  | 4.0 km            |                    |                   | 8.0 km            |                   |                     |
|----------------------------------------------------------------|--|-------------------|--------------------|-------------------|-------------------|-------------------|---------------------|
| Subsample:                                                     |  | 1977-79           | 1980               | 1981-82           | 1977-79           | 1980              | 1981-82             |
| Variable                                                       |  | (1)               | (2)                | (3)               | (4)               | (5)               | (6)                 |
| A. Village characteristics                                     |  |                   |                    |                   |                   |                   |                     |
| Distance to major roads (km)                                   |  | 0.017<br>(0.016)  | 0.032**<br>(0.014) | 0.013<br>(0.012)  | 0.007<br>(0.011)  | 0.016<br>(0.011)  | 0.009<br>(0.009)    |
| Prop. of non-migrant women<br>aged 36-50 with grade 1-5        |  | 0.082<br>(0.122)  | 0.204*<br>(0.121)  | 0.143<br>(0.097)  | 0.049<br>(0.116)  | 0.061<br>(0.115)  | 0.048<br>(0.092)    |
| Prop. of non-migrant women<br>aged 36-50 with grade 6 or above |  | 0.224<br>(0.184)  | 0.239<br>(0.176)   | 0.243<br>(0.155)  | 0.112<br>(0.167)  | 0.218<br>(0.170)  | 0.181<br>(0.151)    |
| Observations                                                   |  | 841               | 865                | 1,076             | 701               | 742               | 960                 |
| Num. of spatially balanced clusters                            |  | 190               | 190                | 190               | 60                | 60                | 60                  |
| R-squared                                                      |  | 0.467             | 0.45               | 0.429             | 0.504             | 0.451             | 0.448               |
| p-value of the listed variables                                |  | 0.498             | 0.040              | 0.217             | 0.846             | 0.327             | 0.539               |
| B. Parental characteristics                                    |  |                   |                    |                   |                   |                   |                     |
| Mother's age                                                   |  | 0.000<br>(0.004)  | -0.001<br>(0.004)  | 0.000<br>(0.003)  | -0.003<br>(0.004) | -0.006<br>(0.004) | 0.002<br>(0.003)    |
| Father's age                                                   |  | -0.001<br>(0.002) | 0.005*<br>(0.003)  | -0.001<br>(0.002) | -0.003<br>(0.002) | -0.002<br>(0.002) | -0.004**<br>(0.002) |
| Mother with grade 1-5                                          |  | 0.018<br>(0.020)  | 0.008<br>(0.022)   | 0.020<br>(0.015)  | 0.020<br>(0.022)  | -0.016<br>(0.022) | -0.005<br>(0.017)   |
| Mother with grade 6 or above                                   |  | 0.016<br>(0.033)  | 0.001<br>(0.040)   | 0.046<br>(0.029)  | 0.032<br>(0.032)  | -0.024<br>(0.033) | -0.002<br>(0.026)   |
| Father with grade 1-5                                          |  | -0.007<br>(0.028) | -0.027<br>(0.028)  | -0.004<br>(0.017) | 0.036<br>(0.028)  | -0.025<br>(0.026) | -0.013<br>(0.016)   |
| Father with grade 6 or above                                   |  | 0.000<br>(0.030)  | -0.030<br>(0.031)  | -0.002<br>(0.022) | 0.040<br>(0.032)  | 0.048<br>(0.031)  | 0.024<br>(0.021)    |
| Observations                                                   |  | 2,294             | 2,210              | 4,005             | 1,914             | 1,914             | 3,511               |
| Num. of spatially balanced clusters                            |  | 190               | 190                | 190               | 60                | 60                | 60                  |
| R-squared                                                      |  | 0.491             | 0.449              | 0.443             | 0.510             | 0.496             | 0.485               |
| p-value of the listed variables                                |  | 0.976             | 0.540              | 0.696             | 0.410             | 0.027             | 0.096               |

*Notes:* The table reports OLS estimates where the unit of observation is the village in panel A and the household in panel B. The dependent variable is an indicator variable equal to 1 if villages are located within 2.0 km (in columns 1-3) and 4.0 km (in columns 4-6) of killing sites and 0 otherwise. All regressions also include zone and district fixed effects and spatial cluster fixed effects. *p*-values are from *F*-tests for the joint significance of the listed variables. Robust standard errors are reported in parentheses in panel A and robust standard errors, adjusted for clustering by village, are reported in parentheses in panel B. \*\*\* = Significant at the 1 percent level. \*\* = Significant at the 5 percent level. \* = Significant at the 10 percent level.

Table A21: Robustness Check – Alternative Genocide Measures

| Subsample:                         | 1977-79              | 1980                | 1981-82            | 1977-79                               | 1980               | 1981-82             | 1977-79                | 1980                | 1981-82            |
|------------------------------------|----------------------|---------------------|--------------------|---------------------------------------|--------------------|---------------------|------------------------|---------------------|--------------------|
|                                    | (1)                  | (2)                 | (3)                | (4)                                   | (5)                | (6)                 | (7)                    | (8)                 | (9)                |
| Cohort:                            |                      |                     |                    |                                       |                    |                     |                        |                     |                    |
| Dependent variable:                | No schooling         |                     |                    | A. Children aged 15-21/18/17          |                    |                     |                        |                     |                    |
|                                    |                      |                     |                    | Primary school completion             |                    |                     |                        |                     |                    |
|                                    |                      |                     |                    | Years of schooling                    |                    |                     |                        |                     |                    |
|                                    |                      |                     |                    | A-1. Quadratic polynomial in distance |                    |                     |                        |                     |                    |
| ln (Genocidal Violence II)         | 0.0254**<br>(0.0111) | -0.0013<br>(0.0100) | 0.0061<br>(0.0085) | -0.0218**<br>(0.0092)                 | 0.0045<br>(0.0123) | 0.0047<br>(0.0120)  | -0.2152***<br>(0.0695) | 0.0028<br>(0.0740)  | 0.0175<br>(0.0642) |
| Mean of the outcome (< 6.0 km)     | 0.231                | 0.222               | 0.200              | 0.317                                 | 0.319              | 0.307               | 4.176                  | 4.177               | 4.171              |
| Mean of ln (Genocidal Violence II) | 4.794                | 4.677               | 4.412              | 4.794                                 | 4.677              | 4.412               | 4.794                  | 4.677               | 4.412              |
| S.D. of ln (Genocidal Violence II) | 2.037                | 2.093               | 1.987              | 2.037                                 | 2.093              | 1.987               | 2.037                  | 2.093               | 1.987              |
| Observations                       | 1,008                | 1,015               | 1,798              | 1,008                                 | 1,015              | 1,798               | 1,008                  | 1,015               | 1,798              |
| R-squared                          | 0.375                | 0.322               | 0.272              | 0.307                                 | 0.264              | 0.209               | 0.441                  | 0.362               | 0.335              |
|                                    |                      |                     |                    | A-2. Cubic polynomial in distance     |                    |                     |                        |                     |                    |
| ln (Genocidal Violence II)         | 0.0171**<br>(0.0075) | 0.0000<br>(0.0067)  | 0.0039<br>(0.0058) | -0.0139**<br>(0.0063)                 | 0.0031<br>(0.0082) | 0.0031<br>(0.0082)  | -0.1430***<br>(0.0478) | -0.0024<br>(0.0493) | 0.0138<br>(0.0439) |
| Mean of the outcome (< 6.0 km)     | 0.231                | 0.222               | 0.200              | 0.317                                 | 0.319              | 0.307               | 4.176                  | 4.177               | 4.171              |
| Mean of ln (Genocidal Violence II) | 3.581                | 3.506               | 3.185              | 3.581                                 | 3.506              | 3.185               | 3.581                  | 3.506               | 3.185              |
| S.D. of ln (Genocidal Violence II) | 2.445                | 2.561               | 2.377              | 2.445                                 | 2.561              | 2.377               | 2.445                  | 2.561               | 2.377              |
| Observations                       | 1,008                | 1,015               | 1,798              | 1,008                                 | 1,015              | 1,798               | 1,008                  | 1,015               | 1,798              |
| R-squared                          | 0.375                | 0.322               | 0.272              | 0.306                                 | 0.264              | 0.209               | 0.441                  | 0.362               | 0.335              |
| Cohort                             |                      |                     |                    |                                       |                    |                     |                        |                     |                    |
| Dependent variable:                | No schooling         |                     |                    | B. Children aged 6-14                 |                    |                     |                        |                     |                    |
|                                    |                      |                     |                    | School attendance                     |                    |                     |                        |                     |                    |
|                                    |                      |                     |                    | Grade progression                     |                    |                     |                        |                     |                    |
|                                    |                      |                     |                    | B-1. Quadratic polynomial in distance |                    |                     |                        |                     |                    |
| ln (Genocidal Violence II)         | 0.0274**<br>(0.0116) | 0.0005<br>(0.0113)  | 0.0076<br>(0.0084) | -0.0272**<br>(0.0119)                 | 0.0038<br>(0.0116) | -0.0068<br>(0.0086) | -0.1096**<br>(0.0446)  | -0.0101<br>(0.0395) | 0.0328<br>(0.0280) |
| Mean of the outcome (< 6.0 km)     | 0.342                | 0.346               | 0.333              | 0.637                                 | 0.637              | 0.647               | -3.669                 | -3.623              | -3.548             |
| Mean of ln (Genocidal Violence II) | 4.786                | 4.678               | 4.408              | 4.786                                 | 4.678              | 4.408               | 4.786                  | 4.678               | 4.408              |
| S.D. of ln (Genocidal Violence II) | 2.047                | 2.107               | 1.994              | 2.047                                 | 2.107              | 1.994               | 2.047                  | 2.107               | 1.994              |
| Observations                       | 951                  | 974                 | 1,752              | 951                                   | 974                | 1,752               | 951                    | 974                 | 1,752              |
| R-squared                          | 0.351                | 0.306               | 0.299              | 0.352                                 | 0.294              | 0.287               | 0.235                  | 0.232               | 0.229              |
|                                    |                      |                     |                    | B-2. Cubic polynomial in distance     |                    |                     |                        |                     |                    |
| ln (Genocidal Violence II)         | 0.0176**<br>(0.0078) | 0.0008<br>(0.0076)  | 0.0045<br>(0.0057) | -0.0176**<br>(0.0080)                 | 0.0021<br>(0.0079) | -0.0038<br>(0.0059) | -0.0750**<br>(0.0302)  | -0.0087<br>(0.0267) | 0.0233<br>(0.0190) |
| Mean of the outcome (< 6.0 km)     | 0.342                | 0.346               | 0.333              | 0.637                                 | 0.637              | 0.647               | -3.669                 | -3.623              | -3.548             |
| Mean of ln (Genocidal Violence II) | 3.568                | 3.508               | 3.182              | 3.568                                 | 3.508              | 3.182               | 3.568                  | 3.508               | 3.182              |
| S.D. of ln (Genocidal Violence II) | 2.460                | 2.583               | 2.389              | 2.460                                 | 2.583              | 2.389               | 2.460                  | 2.583               | 2.389              |
| Observations                       | 951                  | 974                 | 1,752              | 951                                   | 974                | 1,752               | 951                    | 974                 | 1,752              |
| R-squared                          | 0.350                | 0.306               | 0.298              | 0.351                                 | 0.294              | 0.287               | 0.235                  | 0.232               | 0.230              |

Note: See the notes to Table 3.



Table A22: Robustness Check – Non-intellectuals

| Subsample:                         | 1977-79                                    | 1980               | 1981-82            | 1977-79             | 1980               | 1981-82            | 1977-79                               | 1980                | 1981-82             | 1977-79 | 1980 | 1981-82 |
|------------------------------------|--------------------------------------------|--------------------|--------------------|---------------------|--------------------|--------------------|---------------------------------------|---------------------|---------------------|---------|------|---------|
|                                    | (1)                                        | (2)                | (3)                | (4)                 | (5)                | (6)                | (7)                                   | (8)                 | (9)                 | (10)    | (11) | (12)    |
| Cohort:                            | A. Children aged 15-21/18/17               |                    |                    |                     |                    |                    |                                       |                     |                     |         |      |         |
| Dependent variable:                | No schooling                               |                    |                    |                     |                    |                    | Primary school completion             |                     |                     |         |      |         |
|                                    |                                            |                    |                    |                     |                    |                    | A-1. Sample III: Genocidal Violence I |                     |                     |         |      |         |
| Baseline specification             | 0.022<br>(0.026)                           | 0.005<br>(0.030)   | 0.003<br>(0.019)   | 0.005<br>(0.027)    | -0.026<br>(0.031)  | 0.010<br>(0.021)   | -0.194<br>(0.174)                     | -0.328<br>(0.202)   | -0.012<br>(0.126)   |         |      |         |
| R-squared                          | 0.408                                      | 0.381              | 0.287              | 0.288               | 0.300              | 0.211              | 0.419                                 | 0.406               | 0.320               |         |      |         |
| Specification IV                   | 0.034<br>(0.026)                           | 0.017<br>(0.029)   | 0.004<br>(0.019)   | -0.013<br>(0.028)   | -0.038<br>(0.029)  | 0.008<br>(0.021)   | -0.336*<br>(0.181)                    | -0.408**<br>(0.189) | -0.043<br>(0.122)   |         |      |         |
| R-squared                          | 0.444                                      | 0.406              | 0.310              | 0.347               | 0.366              | 0.280              | 0.475                                 | 0.468               | 0.392               |         |      |         |
| Mean ( $\geq 3.0$ km)              | 0.239                                      | 0.220              | 0.201              | 0.247               | 0.292              | 0.286              | 3.786                                 | 4.059               | 4.059               |         |      |         |
| Observations                       | 1,367                                      | 1,486              | 3,004              | 1,367               | 1,486              | 3,004              | 1,367                                 | 1,486               | 3,004               |         |      |         |
| Observations ( $< 3.0$ km of K.S.) | 616                                        | 652                | 1,338              | 616                 | 652                | 1,338              | 616                                   | 652                 | 1,338               |         |      |         |
|                                    | A-2. Sample IV: ln (Genocidal Violence II) |                    |                    |                     |                    |                    |                                       |                     |                     |         |      |         |
| Baseline specification             | 0.0524*<br>(0.0284)                        | 0.0144<br>(0.0215) | 0.0088<br>(0.0166) | -0.0218<br>(0.0199) | 0.0068<br>(0.0278) | 0.0181<br>(0.0224) | -0.3048**<br>(0.1511)                 | -0.0709<br>(0.1612) | 0.0050<br>(0.1168)  |         |      |         |
| R-squared                          | 0.352                                      | 0.335              | 0.285              | 0.219               | 0.221              | 0.182              | 0.370                                 | 0.336               | 0.314               |         |      |         |
| Specification IV                   | 0.0472<br>(0.0292)                         | 0.0222<br>(0.0210) | 0.0088<br>(0.0178) | -0.0282<br>(0.0201) | 0.0060<br>(0.0238) | 0.0156<br>(0.0219) | -0.3546**<br>(0.1550)                 | -0.1006<br>(0.1465) | -0.0055<br>(0.1176) |         |      |         |
| R-squared                          | 0.416                                      | 0.386              | 0.323              | 0.311               | 0.325              | 0.275              | 0.436                                 | 0.421               | 0.411               |         |      |         |
| Mean of the outcome ( $< 6.0$ km)  | 0.284                                      | 0.253              | 0.235              | 0.224               | 0.246              | 0.255              | 3.515                                 | 3.690               | 3.783               |         |      |         |
| Mean of ln (Genocidal Violence II) | 6.045                                      | 5.933              | 5.717              | 6.045               | 5.933              | 5.717              | 6.045                                 | 5.933               | 5.717               |         |      |         |
| S.D. of ln (Genocidal Violence II) | 1.78                                       | 1.798              | 1.734              | 1.78                | 1.798              | 1.734              | 1.78                                  | 1.798               | 1.734               |         |      |         |
| Observations                       | 674                                        | 730                | 1,361              | 674                 | 730                | 1,361              | 674                                   | 730                 | 1,361               |         |      |         |

*Continue*

Table A22: Robustness Check – Non-intellectuals

| Subsample:                         | 1977-79<br>(1)       | 1980<br>(2)         | 1981-82<br>(3)     | 1977-79<br>(4)                             | 1980<br>(5)         | 1981-82<br>(6)      | 1977-79<br>(7)        | 1980<br>(8)         | 1981-82<br>(9)      |
|------------------------------------|----------------------|---------------------|--------------------|--------------------------------------------|---------------------|---------------------|-----------------------|---------------------|---------------------|
| Cohort:                            |                      |                     |                    |                                            |                     |                     |                       |                     |                     |
| Dependent variable:                | No schooling         |                     |                    | School attendance                          |                     |                     | Grade progression     |                     |                     |
|                                    |                      |                     |                    | B. Children aged 6-14                      |                     |                     |                       |                     |                     |
|                                    |                      |                     |                    | B-1. Sample III: Genocidal Violence I      |                     |                     |                       |                     |                     |
| Baseline specification             | 0.020<br>(0.029)     | 0.037<br>(0.029)    | -0.004<br>(0.017)  | -0.018<br>(0.030)                          | -0.051*<br>(0.028)  | 0.015<br>(0.018)    | -0.073<br>(0.122)     | -0.017<br>(0.090)   | 0.037<br>(0.064)    |
| R-squared                          | 0.377                | 0.348               | 0.310              | 0.363                                      | 0.336               | 0.296               | 0.301                 | 0.279               | 0.206               |
| Specification IV                   | 0.031<br>(0.030)     | 0.038<br>(0.027)    | -0.002<br>(0.016)  | -0.030<br>(0.031)                          | -0.054**<br>(0.026) | 0.012<br>(0.017)    | -0.116<br>(0.103)     | -0.037<br>(0.084)   | -0.004<br>(0.056)   |
| R-squared                          | 0.463                | 0.416               | 0.372              | 0.441                                      | 0.398               | 0.351               | 0.587                 | 0.530               | 0.494               |
| Mean ( $\geq 3.0$ km)              | 0.368                | 0.350               | 0.338              | 0.607                                      | 0.635               | 0.641               | -3.766                | -3.732              | -3.613              |
| Observations                       | 1,295                | 1,431               | 2,926              | 1,295                                      | 1,431               | 2,926               | 1,295                 | 1,431               | 2,926               |
| Observations ( $< 3.0$ km of K.S.) | 580                  | 628                 | 1,296              | 580                                        | 628                 | 1,296               | 580                   | 628                 | 1,296               |
|                                    |                      |                     |                    | B-2. Sample IV: ln (Genocidal Violence II) |                     |                     |                       |                     |                     |
| Baseline specification             | 0.0518*<br>(0.0285)  | -0.0057<br>(0.0246) | 0.0166<br>(0.0161) | -0.0519*<br>(0.0296)                       | 0.0073<br>(0.0245)  | -0.0134<br>(0.0172) | -0.2034**<br>(0.1024) | -0.0208<br>(0.0776) | 0.0596<br>(0.0687)  |
| R-squared                          | 0.348                | 0.308               | 0.299              | 0.351                                      | 0.304               | 0.286               | 0.255                 | 0.253               | 0.198               |
| Specification IV                   | 0.0747**<br>(0.0290) | 0.0092<br>(0.0238)  | 0.0091<br>(0.0158) | -0.0760**<br>(0.0300)                      | -0.0072<br>(0.0237) | -0.0082<br>(0.0171) | -0.2005**<br>(0.0894) | 0.0011<br>(0.0732)  | -0.0148<br>(0.0505) |
| R-squared                          | 0.460                | 0.408               | 0.370              | 0.447                                      | 0.392               | 0.345               | 0.601                 | 0.523               | 0.509               |
| Mean of the outcome ( $< 6.0$ km)  | 0.400                | 0.395               | 0.371              | 0.576                                      | 0.588               | 0.608               | -3.832                | -3.789              | -3.705              |
| Mean of ln (Genocidal Violence II) | 6.058                | 5.937               | 5.706              | 6.058                                      | 5.937               | 5.706               | 6.058                 | 5.937               | 5.706               |
| S.D. of ln (Genocidal Violence II) | 1.776                | 1.804               | 1.738              | 1.776                                      | 1.804               | 1.738               | 1.776                 | 1.804               | 1.738               |
| Observations                       | 635                  | 705                 | 1,329              | 635                                        | 705                 | 1,329               | 635                   | 705                 | 1,329               |

Notes: See the notes to Tables 3 and 4. Non-intellectuals are couples with grade 0-5 completed.

Table A23: Heterogeneity – Gender Differences

| Subsample:                         | 1977-79            | 1980              | 1981-82            | 1977-79                               | 1980               | 1981-82           | 1977-79              | 1980                | 1981-82           |
|------------------------------------|--------------------|-------------------|--------------------|---------------------------------------|--------------------|-------------------|----------------------|---------------------|-------------------|
|                                    | (1)                | (2)               | (3)                | (4)                                   | (5)                | (6)               | (7)                  | (8)                 | (9)               |
| Cohort:                            |                    |                   |                    |                                       |                    |                   |                      |                     |                   |
| Dependent variable:                | No schooling       |                   |                    | Years of schooling                    |                    |                   |                      |                     |                   |
|                                    |                    |                   |                    | A. Children aged 15-21/18/17          |                    |                   |                      |                     |                   |
|                                    |                    |                   |                    | A-1. Sample III: Genocidal Violence I |                    |                   |                      |                     |                   |
|                                    |                    |                   |                    | A-1-1. Male                           |                    |                   |                      |                     |                   |
| Baseline specification             | 0.046**<br>(0.022) | -0.011<br>(0.022) | -0.028*<br>(0.017) | -0.027<br>(0.030)                     | -0.001<br>(0.032)  | -0.013<br>(0.028) | -0.398**<br>(0.180)  | -0.142<br>(0.195)   | -0.034<br>(0.166) |
| R-squared                          | 0.344              | 0.300             | 0.276              | 0.319                                 | 0.311              | 0.262             | 0.405                | 0.372               | 0.359             |
| Specification IV                   | 0.049**<br>(0.022) | -0.010<br>(0.023) | -0.031*<br>(0.017) | -0.044<br>(0.029)                     | -0.006<br>(0.033)  | -0.016<br>(0.026) | -0.494***<br>(0.172) | -0.164<br>(0.194)   | -0.047<br>(0.148) |
| R-squared                          | 0.368              | 0.320             | 0.291              | 0.370                                 | 0.362              | 0.315             | 0.458                | 0.430               | 0.423             |
| Mean ( $\geq 3.0$ km)              | 0.144              | 0.125             | 0.126              | 0.427                                 | 0.457              | 0.443             | 4.995                | 5.249               | 5.143             |
| Observations                       | 1,639              | 1,487             | 2,345              | 1,639                                 | 1,487              | 2,345             | 1,639                | 1,487               | 2,345             |
| Observations ( $< 3.0$ km of K.S.) | 751                | 659               | 1,030              | 751                                   | 659                | 1,030             | 751                  | 659                 | 1,030             |
|                                    |                    |                   |                    | A-1-2. Female                         |                    |                   |                      |                     |                   |
| Baseline specification             | -0.002<br>(0.027)  | 0.018<br>(0.028)  | 0.018<br>(0.022)   | -0.031<br>(0.029)                     | -0.048*<br>(0.029) | 0.015<br>(0.022)  | -0.242<br>(0.175)    | -0.417**<br>(0.184) | -0.011<br>(0.138) |
| R-squared                          | 0.445              | 0.421             | 0.332              | 0.357                                 | 0.384              | 0.314             | 0.510                | 0.486               | 0.434             |
| Specification IV                   | 0.012<br>(0.027)   | 0.023<br>(0.027)  | 0.018<br>(0.023)   | -0.042<br>(0.028)                     | -0.035<br>(0.029)  | 0.013<br>(0.023)  | -0.347**<br>(0.172)  | -0.392**<br>(0.191) | -0.028<br>(0.143) |
| R-squared                          | 0.459              | 0.435             | 0.344              | 0.396                                 | 0.422              | 0.334             | 0.538                | 0.518               | 0.452             |
| Mean ( $\geq 3.0$ km)              | 0.236              | 0.225             | 0.221              | 0.298                                 | 0.309              | 0.258             | 4.076                | 4.138               | 3.881             |
| Observations                       | 1,575              | 1,498             | 2,293              | 1,575                                 | 1,498              | 2,293             | 1,575                | 1,498               | 2,293             |
| Observations ( $< 3.0$ km of K.S.) | 696                | 653               | 1,007              | 696                                   | 653                | 1,007             | 696                  | 653                 | 1,007             |

*Continue*

Table A23: Heterogeneity – Gender Differences

| Subsample:                         | 1977-79<br>(1)                             | 1980<br>(2)         | 1981-82<br>(3)     | 1977-79<br>(4)            | 1980<br>(5)         | 1981-82<br>(6)      | 1977-79<br>(7)         | 1980<br>(8)         | 1981-82<br>(9)      |
|------------------------------------|--------------------------------------------|---------------------|--------------------|---------------------------|---------------------|---------------------|------------------------|---------------------|---------------------|
| Cohort:                            | A. Children aged 15-21/18/17               |                     |                    |                           |                     |                     |                        |                     |                     |
| Dependent variable:                | No schooling                               |                     |                    | Primary school completion |                     |                     | Years of schooling     |                     |                     |
|                                    | A-2. Sample IV: ln (Genocidal Violence II) |                     |                    |                           |                     |                     |                        |                     |                     |
|                                    | A-2-1. Male                                |                     |                    |                           |                     |                     |                        |                     |                     |
| Baseline specification             | 0.0420*<br>(0.0240)                        | 0.0121<br>(0.0213)  | 0.0082<br>(0.0180) | -0.0456*<br>(0.0256)      | 0.0270<br>(0.0328)  | 0.0334<br>(0.0321)  | -0.4409***<br>(0.1632) | -0.1025<br>(0.1710) | 0.1398<br>(0.1654)  |
| R-squared                          | 0.326                                      | 0.261               | 0.262              | 0.269                     | 0.29                | 0.241               | 0.374                  | 0.348               | 0.333               |
| Specification IV                   | 0.0370<br>(0.0245)                         | 0.0157<br>(0.0233)  | 0.0076<br>(0.0196) | -0.0466*<br>(0.0250)      | 0.0240<br>(0.0329)  | 0.0339<br>(0.0333)  | -0.4688***<br>(0.1590) | -0.1659<br>(0.1867) | 0.1684<br>(0.1727)  |
| R-squared                          | 0.375                                      | 0.307               | 0.292              | 0.342                     | 0.376               | 0.298               | 0.432                  | 0.428               | 0.407               |
| Mean of the outcome (< 6.0 km)     | 0.170                                      | 0.144               | 0.153              | 0.379                     | 0.420               | 0.387               | 4.665                  | 4.948               | 4.719               |
| Mean of ln (Genocidal Violence II) | 6.022                                      | 5.864               | 5.651              | 6.022                     | 5.864               | 5.651               | 6.022                  | 5.864               | 5.651               |
| S.D. of ln (Genocidal Violence II) | 1.736                                      | 1.742               | 1.707              | 1.736                     | 1.742               | 1.707               | 1.736                  | 1.742               | 1.707               |
| Observations                       | 771                                        | 698                 | 1,046              | 771                       | 698                 | 1,046               | 771                    | 698                 | 1,046               |
|                                    | A-2-2. Female                              |                     |                    |                           |                     |                     |                        |                     |                     |
| Baseline specification             | 0.0351<br>(0.0351)                         | -0.0156<br>(0.0271) | 0.0343<br>(0.0227) | -0.0430*<br>(0.0255)      | 0.0108<br>(0.0267)  | -0.0231<br>(0.0199) | -0.2775<br>(0.2028)    | 0.1723<br>(0.1697)  | -0.1598<br>(0.1310) |
| R-squared                          | 0.391                                      | 0.377               | 0.329              | 0.319                     | 0.285               | 0.228               | 0.464                  | 0.413               | 0.396               |
| Specification IV                   | 0.0312<br>(0.0363)                         | -0.0122<br>(0.0277) | 0.0237<br>(0.0239) | -0.0511*<br>(0.0264)      | -0.0016<br>(0.0254) | -0.0213<br>(0.0195) | -0.3097<br>(0.2115)    | 0.1117<br>(0.1695)  | -0.1292<br>(0.1277) |
| R-squared                          | 0.434                                      | 0.425               | 0.354              | 0.416                     | 0.396               | 0.315               | 0.526                  | 0.502               | 0.455               |
| Mean of the outcome (< 6.0 km)     | 0.282                                      | 0.285               | 0.254              | 0.265                     | 0.223               | 0.226               | 3.736                  | 3.480               | 3.557               |
| Mean of ln (Genocidal Violence II) | 6.022                                      | 5.864               | 5.651              | 6.022                     | 5.864               | 5.651               | 6.022                  | 5.864               | 5.651               |
| S.D. of ln (Genocidal Violence II) | 1.736                                      | 1.742               | 1.707              | 1.736                     | 1.742               | 1.707               | 1.736                  | 1.742               | 1.707               |
| Observations                       | 757                                        | 711                 | 1,043              | 757                       | 711                 | 1,043               | 757                    | 711                 | 1,043               |
|                                    | Continue                                   |                     |                    |                           |                     |                     |                        |                     |                     |

*Continue*

Table A23: Heterogeneity – Gender Differences

| Subsample:                         | 1977-79<br>(1)                        | 1980<br>(2)        | 1981-82<br>(3)    | 1977-79<br>(4)       | 1980<br>(5)         | 1981-82<br>(6)   | 1977-79<br>(7)       | 1980<br>(8)        | 1981-82<br>(9)    |
|------------------------------------|---------------------------------------|--------------------|-------------------|----------------------|---------------------|------------------|----------------------|--------------------|-------------------|
| Cohort:                            | B. Children aged 6-14                 |                    |                   |                      |                     |                  |                      |                    |                   |
| Dependent variable:                | No schooling                          |                    |                   | School attendance    |                     |                  | Grade progression    |                    |                   |
|                                    | B-1. Sample III: Genocidal Violence I |                    |                   |                      |                     |                  |                      |                    |                   |
|                                    | B-1-1. Male                           |                    |                   |                      |                     |                  |                      |                    |                   |
| Baseline specification             | 0.060**<br>(0.030)                    | 0.029<br>(0.027)   | -0.015<br>(0.018) | -0.061**<br>(0.030)  | -0.033<br>(0.028)   | 0.010<br>(0.019) | -0.174<br>(0.117)    | 0.016<br>(0.110)   | 0.042<br>(0.078)  |
| R-squared                          | 0.292                                 | 0.312              | 0.257             | 0.294                | 0.296               | 0.258            | 0.214                | 0.229              | 0.185             |
| Specification IV                   | 0.074***<br>(0.027)                   | 0.016<br>(0.025)   | -0.019<br>(0.017) | -0.075***<br>(0.028) | -0.020<br>(0.026)   | 0.013<br>(0.018) | -0.267***<br>(0.095) | -0.106<br>(0.085)  | -0.019<br>(0.061) |
| R-squared                          | 0.429                                 | 0.439              | 0.385             | 0.417                | 0.417               | 0.369            | 0.582                | 0.577              | 0.538             |
| Mean ( $\geq 3.0$ km)              | 0.309                                 | 0.305              | 0.305             | 0.679                | 0.685               | 0.686            | -3.447               | -3.592             | -3.454            |
| Observations                       | 1,609                                 | 1,661              | 3,201             | 1,609                | 1,661               | 3,201            | 1,609                | 1,661              | 3,201             |
| Observations ( $< 3.0$ km of K.S.) | 730                                   | 733                | 1,412             | 730                  | 733                 | 1,412            | 730                  | 733                | 1,412             |
|                                    | B-1-2. Female                         |                    |                   |                      |                     |                  |                      |                    |                   |
| Baseline specification             | 0.021<br>(0.024)                      | 0.053**<br>(0.026) | 0.012<br>(0.018)  | -0.022<br>(0.025)    | -0.054**<br>(0.026) | 0.002<br>(0.019) | -0.141<br>(0.103)    | -0.159*<br>(0.088) | -0.007<br>(0.058) |
| R-squared                          | 0.431                                 | 0.395              | 0.366             | 0.400                | 0.360               | 0.329            | 0.585                | 0.575              | 0.548             |
| Specification IV                   | 0.031<br>(0.025)                      | 0.052**<br>(0.026) | 0.011<br>(0.018)  | -0.030<br>(0.026)    | -0.053**<br>(0.026) | 0.004<br>(0.019) | -0.188*<br>(0.105)   | -0.166*<br>(0.089) | -0.005<br>(0.059) |
| R-squared                          | 0.441                                 | 0.405              | 0.371             | 0.408                | 0.370               | 0.334            | 0.600                | 0.586              | 0.555             |
| Mean ( $\geq 3.0$ km)              | 0.336                                 | 0.322              | 0.318             | 0.636                | 0.655               | 0.655            | -3.584               | -3.508             | -3.458            |
| Observations                       | 1,573                                 | 1,648              | 3,171             | 1,573                | 1,648               | 3,171            | 1,573                | 1,648              | 3,171             |
| Observations ( $< 3.0$ km of K.S.) | 703                                   | 724                | 1,340             | 703                  | 724                 | 1,340            | 703                  | 724                | 1,340             |
|                                    | Continue                              |                    |                   |                      |                     |                  |                      |                    |                   |

*Continue*

Table A23: Heterogeneity – Gender Differences

| Subsample:                         | 1977-79<br>(1)                             | 1980<br>(2)         | 1981-82<br>(3)      | 1977-79<br>(4)         | 1980<br>(5)         | 1981-82<br>(6)      | 1977-79<br>(7)         | 1980<br>(8)         | 1981-82<br>(9)      |
|------------------------------------|--------------------------------------------|---------------------|---------------------|------------------------|---------------------|---------------------|------------------------|---------------------|---------------------|
| Cohort:                            | B. Children aged 6-14                      |                     |                     |                        |                     |                     |                        |                     |                     |
| Dependent variable:                | No schooling                               |                     |                     | School attendance      |                     |                     | Grade progression      |                     |                     |
|                                    | B-2. Sample IV: ln (Genocidal Violence II) |                     |                     |                        |                     |                     |                        |                     |                     |
|                                    | B-2-1. Male                                |                     |                     |                        |                     |                     |                        |                     |                     |
| Baseline specification             | 0.0723***<br>(0.0252)                      | 0.0078<br>(0.0274)  | 0.0140<br>(0.0175)  | -0.0699***<br>(0.0260) | -0.0052<br>(0.0284) | -0.0161<br>(0.0178) | -0.3761***<br>(0.0916) | 0.0222<br>(0.1069)  | 0.1057<br>(0.0661)  |
| R-squared                          | 0.298                                      | 0.299               | 0.262               | 0.304                  | 0.290               | 0.262               | 0.183                  | 0.192               | 0.189               |
| Specification IV                   | 0.1025***<br>(0.0259)                      | 0.0198<br>(0.0234)  | -0.0043<br>(0.0166) | -0.0983***<br>(0.0266) | -0.0172<br>(0.0242) | 0.0017<br>(0.0170)  | -0.3663***<br>(0.0830) | -0.0103<br>(0.0898) | 0.0183<br>(0.0516)  |
| R-squared                          | 0.455                                      | 0.432               | 0.395               | 0.445                  | 0.418               | 0.379               | 0.583                  | 0.593               | 0.553               |
| Mean of the outcome (< 6.0 km)     | 0.342                                      | 0.350               | 0.328               | 0.644                  | 0.641               | 0.660               | -3.628                 | -3.637              | -3.538              |
| Mean of ln (Genocidal Violence II) | 6.007                                      | 5.911               | 5.645               | 6.007                  | 5.911               | 5.645               | 6.007                  | 5.911               | 5.645               |
| S.D. of ln (Genocidal Violence II) | 1.741                                      | 1.772               | 1.719               | 1.741                  | 1.772               | 1.719               | 1.741                  | 1.772               | 1.719               |
| Observations                       | 766                                        | 769                 | 1,447               | 766                    | 769                 | 1,447               | 766                    | 769                 | 1,447               |
|                                    | B-2-2. Female                              |                     |                     |                        |                     |                     |                        |                     |                     |
| Baseline specification             | 0.0429<br>(0.0305)                         | -0.0013<br>(0.0247) | 0.0044<br>(0.0181)  | -0.0417<br>(0.0310)    | 0.0125<br>(0.0231)  | 0.0007<br>(0.0187)  | -0.0268<br>(0.1178)    | -0.0458<br>(0.1054) | 0.0282<br>(0.0869)  |
| R-squared                          | 0.320                                      | 0.249               | 0.270               | 0.317                  | 0.242               | 0.256               | 0.231                  | 0.214               | 0.189               |
| Specification IV                   | 0.0319<br>(0.0302)                         | 0.0165<br>(0.0212)  | 0.0110<br>(0.0177)  | -0.0329<br>(0.0301)    | -0.0069<br>(0.0201) | -0.0074<br>(0.0185) | -0.1777<br>(0.1161)    | -0.0292<br>(0.0863) | -0.0170<br>(0.0683) |
| R-squared                          | 0.447                                      | 0.401               | 0.385               | 0.418                  | 0.372               | 0.354               | 0.626                  | 0.581               | 0.574               |
| Mean of the outcome (< 6.0 km)     | 0.369                                      | 0.364               | 0.349               | 0.604                  | 0.614               | 0.628               | -3.676                 | -3.607              | -3.535              |
| Mean of ln (Genocidal Violence II) | 6.030                                      | 5.831               | 5.625               | 6.030                  | 5.831               | 5.625               | 6.030                  | 5.831               | 5.625               |
| S.D. of ln (Genocidal Violence II) | 1.705                                      | 1.763               | 1.711               | 1.705                  | 1.763               | 1.711               | 1.705                  | 1.763               | 1.711               |
| Observations                       | 726                                        | 779                 | 1,429               | 726                    | 779                 | 1,429               | 726                    | 779                 | 1,429               |

Note: See the notes to Tables 3 and 4.

Table A24: Heterogeneity – First Child

| Subsample:                         |  | 1977-79                                  | 1980               | 1981-82            | 1977-79                             | 1980               | 1981-82            | 1977-79                | 1980                | 1981-82            |
|------------------------------------|--|------------------------------------------|--------------------|--------------------|-------------------------------------|--------------------|--------------------|------------------------|---------------------|--------------------|
|                                    |  | (1)                                      | (2)                | (3)                | (4)                                 | (5)                | (6)                | (7)                    | (8)                 | (9)                |
| Cohort:                            |  | First child                              |                    |                    |                                     |                    |                    |                        |                     |                    |
| Dependent variable:                |  | No schooling                             |                    |                    | Primary school completion           |                    |                    | Years of schooling     |                     |                    |
|                                    |  |                                          |                    |                    | A. Sample III: Genocidal Violence I |                    |                    |                        |                     |                    |
| Baseline specification             |  | 0.052**<br>(0.021)                       | 0.005<br>(0.022)   | -0.005<br>(0.016)  | -0.051*<br>(0.026)                  | -0.022<br>(0.028)  | 0.012<br>(0.020)   | -0.636***<br>(0.168)   | -0.204<br>(0.175)   | 0.038<br>(0.123)   |
| R-squared                          |  | 0.323                                    | 0.329              | 0.262              | 0.293                               | 0.280              | 0.230              | 0.391                  | 0.366               | 0.339              |
| Specification IV                   |  | 0.053**<br>(0.021)                       | 0.013<br>(0.022)   | -0.004<br>(0.016)  | -0.056**<br>(0.026)                 | -0.032<br>(0.028)  | 0.006<br>(0.019)   | -0.682***<br>(0.164)   | -0.297*<br>(0.169)  | -0.297*<br>(0.169) |
| R-squared                          |  | 0.349                                    | 0.357              | 0.285              | 0.343                               | 0.354              | 0.300              | 0.443                  | 0.452               | 0.452              |
| Mean ( $\geq 3.0$ km)              |  | 0.189                                    | 0.19               | 0.176              | 0.398                               | 0.406              | 0.364              | 4.863                  | 4.782               | 4.592              |
| Observations                       |  | 2,137                                    | 2,154              | 4,011              | 2,137                               | 2,154              | 4,011              | 2,137                  | 2,154               | 4,011              |
| Observations ( $< 3.0$ km of K.S.) |  | 965                                      | 945                | 1,764              | 965                                 | 945                | 1,764              | 965                    | 945                 | 1,764              |
|                                    |  | B. Sample IV: ln (Genocidal Violence II) |                    |                    |                                     |                    |                    |                        |                     |                    |
| Baseline specification             |  | 0.0567**<br>(0.0237)                     | 0.0027<br>(0.0191) | 0.0119<br>(0.0155) | -0.0565**<br>(0.0247)               | 0.0120<br>(0.0251) | 0.0147<br>(0.0223) | -0.4838***<br>(0.1642) | 0.0460<br>(0.1603)  | 0.0466<br>(0.1201) |
| R-squared                          |  | 0.308                                    | 0.298              | 0.261              | 0.260                               | 0.239              | 0.204              | 0.373                  | 0.324               | 0.323              |
| Specification IV                   |  | 0.0527**<br>(0.0261)                     | 0.0109<br>(0.0189) | 0.0105<br>(0.0166) | -0.0677**<br>(0.0262)               | 0.0032<br>(0.0215) | 0.0126<br>(0.0221) | -0.5288***<br>(0.1739) | -0.0219<br>(0.1435) | 0.0403<br>(0.1198) |
| R-squared                          |  | 0.356                                    | 0.341              | 0.291              | 0.323                               | 0.354              | 0.278              | 0.437                  | 0.440               | 0.405              |
| Mean of the outcome ( $< 6.0$ km)  |  | 0.224                                    | 0.234              | 0.206              | 0.357                               | 0.345              | 0.316              | 4.493                  | 4.301               | 4.214              |
| Mean of ln (Genocidal Violence II) |  | 6.022                                    | 5.864              | 5.651              | 6.022                               | 5.864              | 5.651              | 6.022                  | 5.864               | 5.651              |
| S.D. of ln (Genocidal Violence II) |  | 1.736                                    | 1.742              | 1.707              | 1.736                               | 1.742              | 1.707              | 1.736                  | 1.742               | 1.707              |
| Observations                       |  | 1,008                                    | 1,015              | 1,798              | 1,008                               | 1,015              | 1,798              | 1,008                  | 1,015               | 1,798              |

*Note:* See the notes to Tables 3 and 4.

Table A25: Heterogeneity – Five Subsamples

| Subsample:                              | 1977-78<br>(1)            | 1979<br>(2)         | 1980<br>(3)       | 1981<br>(4)       | 1982<br>(5)       | 1977-78<br>(6)     | 1979<br>(7)       | 1980<br>(8)        | 1981<br>(9)       | 1982<br>(10)      |
|-----------------------------------------|---------------------------|---------------------|-------------------|-------------------|-------------------|--------------------|-------------------|--------------------|-------------------|-------------------|
| A. Sample III: Genocidal Violence I     |                           |                     |                   |                   |                   |                    |                   |                    |                   |                   |
| Cohort: Children aged 15-21/19/18/17/16 |                           |                     |                   |                   |                   |                    |                   |                    |                   |                   |
| Dependent variable:                     | No schooling              |                     |                   |                   |                   | Children aged 6-14 |                   |                    |                   |                   |
|                                         |                           |                     |                   |                   |                   | No schooling       |                   |                    |                   |                   |
| Baseline specification                  | 0.030<br>(0.035)          | 0.028<br>(0.030)    | -0.018<br>(0.023) | 0.001<br>(0.023)  | -0.035<br>(0.027) | 0.058*<br>(0.035)  | -0.009<br>(0.031) | 0.029<br>(0.024)   | -0.022<br>(0.022) | -0.013<br>(0.023) |
| R-squared                               | 0.392                     | 0.337               | 0.258             | 0.229             | 0.213             | 0.363              | 0.353             | 0.273              | 0.291             | 0.273             |
| Specification IV                        | 0.039<br>(0.035)          | 0.039<br>(0.029)    | -0.005<br>(0.022) | 0.009<br>(0.022)  | -0.028<br>(0.028) | 0.059<br>(0.036)   | 0.009<br>(0.032)  | 0.040*<br>(0.023)  | -0.016<br>(0.022) | -0.009<br>(0.023) |
| R-squared                               | 0.403                     | 0.363               | 0.268             | 0.238             | 0.222             | 0.366              | 0.373             | 0.284              | 0.293             | 0.279             |
| Mean ( $\geq 3.0$ km)                   | 0.205                     | 0.178               | 0.184             | 0.162             | 0.180             | 0.296              | 0.328             | 0.306              | 0.299             | 0.312             |
| Dependent variable:                     | Primary school completion |                     |                   |                   |                   | School attendance  |                   |                    |                   |                   |
|                                         |                           |                     |                   |                   |                   |                    |                   |                    |                   |                   |
| Baseline specification                  | -0.029<br>(0.038)         | 0.001<br>(0.038)    | -0.006<br>(0.029) | 0.006<br>(0.028)  | 0.040<br>(0.032)  | -0.060*<br>(0.036) | 0.011<br>(0.032)  | -0.029<br>(0.024)  | 0.032<br>(0.022)  | 0.020<br>(0.023)  |
| R-squared                               | 0.300                     | 0.274               | 0.212             | 0.216             | 0.185             | 0.357              | 0.342             | 0.260              | 0.281             | 0.266             |
| Specification IV                        | -0.039<br>(0.038)         | -0.021<br>(0.036)   | -0.027<br>(0.029) | -0.015<br>(0.027) | 0.015<br>(0.032)  | -0.062*<br>(0.037) | -0.008<br>(0.033) | -0.039*<br>(0.023) | 0.025<br>(0.022)  | 0.015<br>(0.023)  |
| R-squared                               | 0.332                     | 0.296               | 0.232             | 0.233             | 0.201             | 0.360              | 0.361             | 0.270              | 0.283             | 0.271             |
| Mean ( $\geq 3.0$ km)                   | 0.333                     | 0.373               | 0.375             | 0.369             | 0.335             | 0.676              | 0.657             | 0.677              | 0.681             | 0.670             |
| Dependent variable:                     | Years of schooling        |                     |                   |                   |                   | Grade progression  |                   |                    |                   |                   |
|                                         |                           |                     |                   |                   |                   |                    |                   |                    |                   |                   |
| Baseline specification                  | -0.217<br>(0.263)         | -0.312<br>(0.245)   | -0.075<br>(0.194) | 0.035<br>(0.197)  | 0.206<br>(0.199)  | -0.288*<br>(0.164) | 0.022<br>(0.114)  | 0.025<br>(0.078)   | 0.030<br>(0.081)  | 0.084<br>(0.092)  |
| R-squared                               | 0.380                     | 0.333               | 0.271             | 0.276             | 0.244             | 0.307              | 0.300             | 0.221              | 0.217             | 0.224             |
| Specification IV                        | -0.311<br>(0.261)         | -0.471**<br>(0.237) | -0.234<br>(0.185) | -0.112<br>(0.186) | 0.067<br>(0.197)  | -0.312*<br>(0.165) | -0.047<br>(0.124) | -0.006<br>(0.076)  | -0.012<br>(0.079) | 0.024<br>(0.094)  |
| R-squared                               | 0.410                     | 0.365               | 0.294             | 0.299             | 0.262             | 0.326              | 0.312             | 0.229              | 0.227             | 0.234             |
| Mean ( $\geq 3.0$ km)                   | 4.369                     | 4.631               | 4.61              | 4.631             | 4.413             | -3.534             | -3.557            | -3.565             | -3.388            | -3.501            |
| Observations                            | 951                       | 1,186               | 2,154             | 2,148             | 1,863             | 896                | 1,131             | 2,068              | 2,083             | 1,817             |
| Observations ( $< 3.0$ km of K.S.)      | 431                       | 534                 | 945               | 946               | 818               | 402                | 506               | 909                | 909               | 796               |

*Continue*



Table A25: Heterogeneity – Five Subsamples

| Subsample:                               | 1977-78<br>(1)            | 1979<br>(2)          | 1980<br>(3)         | 1981<br>(4)         | 1982<br>(5)         | 1977-78<br>(6)        | 1979<br>(7)           | 1980<br>(8)         | 1981<br>(9)         | 1982<br>(10)        |
|------------------------------------------|---------------------------|----------------------|---------------------|---------------------|---------------------|-----------------------|-----------------------|---------------------|---------------------|---------------------|
| B. Sample IV: ln (Genocidal Violence II) |                           |                      |                     |                     |                     |                       |                       |                     |                     |                     |
| Cohort:                                  |                           |                      |                     |                     |                     |                       |                       |                     |                     |                     |
| Dependent variable:                      | Children aged 15-21/18/17 |                      |                     |                     |                     |                       | Children aged 6-14    |                     |                     |                     |
|                                          | No schooling              |                      |                     |                     |                     |                       | No schooling          |                     |                     |                     |
| Baseline specification                   | 0.0433<br>(0.0496)        | 0.0444*<br>(0.0248)  | -0.0010<br>(0.0217) | 0.0174<br>(0.0218)  | 0.0022<br>(0.0245)  | 0.0948**<br>(0.0440)  | 0.0384<br>(0.0269)    | 0.0050<br>(0.0239)  | 0.0156<br>(0.0197)  | 0.0200<br>(0.0292)  |
| R-squared                                | 0.311                     | 0.262                | 0.225               | 0.222               | 0.194               | 0.313                 | 0.300                 | 0.244               | 0.262               | 0.260               |
| Specification IV                         | 0.0486<br>(0.0501)        | 0.0538**<br>(0.0252) | 0.0027<br>(0.0215)  | 0.0192<br>(0.0221)  | -0.0049<br>(0.0245) | 0.0965**<br>(0.0466)  | 0.0572**<br>(0.0274)  | 0.0087<br>(0.0227)  | 0.0160<br>(0.0199)  | 0.0176<br>(0.0280)  |
| R-squared                                | 0.339                     | 0.299                | 0.235               | 0.233               | 0.213               | 0.325                 | 0.346                 | 0.266               | 0.272               | 0.271               |
| Mean of the outcome (< 6.0 km)           | 0.258                     | 0.209                | 0.222               | 0.193               | 0.208               | 0.332                 | 0.351                 | 0.346               | 0.327               | 0.340               |
| Dependent variable:                      | Primary school completion |                      |                     |                     |                     |                       | School attendance     |                     |                     |                     |
|                                          | No schooling              |                      |                     |                     |                     |                       | No schooling          |                     |                     |                     |
| Baseline specification                   | -0.0538<br>(0.0384)       | -0.0073<br>(0.0240)  | 0.0014<br>(0.0260)  | -0.0049<br>(0.0305) | 0.0248<br>(0.0279)  | -0.0912**<br>(0.0445) | -0.0395<br>(0.0265)   | 0.0037<br>(0.0245)  | -0.0100<br>(0.0209) | -0.0260<br>(0.0300) |
| R-squared                                | 0.228                     | 0.215                | 0.171               | 0.191               | 0.129               | 0.328                 | 0.293                 | 0.235               | 0.248               | 0.245               |
| Specification IV                         | -0.0656<br>(0.0406)       | -0.0177<br>(0.0243)  | -0.0024<br>(0.0265) | -0.0136<br>(0.0297) | 0.0217<br>(0.0269)  | -0.0923**<br>(0.0465) | -0.0578**<br>(0.0273) | 0.0001<br>(0.0227)  | -0.0101<br>(0.0212) | -0.0246<br>(0.0290) |
| R-squared                                | 0.274                     | 0.261                | 0.189               | 0.217               | 0.148               | 0.335                 | 0.337                 | 0.259               | 0.256               | 0.255               |
| Mean of the outcome (< 6.0 km)           | 0.302                     | 0.329                | 0.319               | 0.328               | 0.283               | 0.645                 | 0.63                  | 0.637               | 0.656               | 0.637               |
| Dependent variable:                      | Years of schooling        |                      |                     |                     |                     |                       | Grade progression     |                     |                     |                     |
|                                          | No schooling              |                      |                     |                     |                     |                       | No schooling          |                     |                     |                     |
| Baseline specification                   | -0.4028<br>(0.3159)       | -0.2254<br>(0.1754)  | -0.0266<br>(0.1723) | 0.0067<br>(0.1911)  | 0.0612<br>(0.1610)  | -0.2925<br>(0.1942)   | -0.0603<br>(0.0964)   | -0.0265<br>(0.0735) | 0.0728<br>(0.0722)  | 0.0386<br>(0.0916)  |
| R-squared                                | 0.286                     | 0.276                | 0.236               | 0.251               | 0.195               | 0.271                 | 0.216                 | 0.180               | 0.190               | 0.220               |
| Specification IV                         | -0.4977<br>(0.3428)       | -0.3133*<br>(0.1786) | -0.0584<br>(0.1739) | -0.0437<br>(0.1916) | 0.0722<br>(0.1533)  | -0.3170<br>(0.2022)   | -0.1031<br>(0.1055)   | -0.0498<br>(0.0744) | 0.0393<br>(0.0702)  | 0.0200<br>(0.0911)  |
| R-squared                                | 0.345                     | 0.328                | 0.256               | 0.279               | 0.221               | 0.299                 | 0.235                 | 0.191               | 0.215               | 0.230               |
| Mean of the outcome (< 6.0 km)           | 4.066                     | 4.264                | 4.177               | 4.283               | 4.038               | -3.666                | -3.672                | -3.623              | -3.482              | -3.627              |
| Mean of ln (Genocidal Violence II)       | 6.081                     | 5.975                | 5.864               | 5.658               | 5.643               | 6.068                 | 5.978                 | 5.864               | 5.658               | 5.634               |
| S.D. of ln (Genocidal Violence II)       | 1.694                     | 1.769                | 1.742               | 1.721               | 1.693               | 1.701                 | 1.771                 | 1.749               | 1.722               | 1.697               |
| Observations                             | 449                       | 559                  | 1,015               | 979                 | 819                 | 424                   | 527                   | 974                 | 951                 | 801                 |

Note: See the notes to Tables 3 and 4.