The 'New Wars' Debate Revisited: An Empirical Evaluation of the Atrociousness of 'New Wars'

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1. INTRODUCTION

The Cold War was ended by a largely peaceful wave of democratization. At the same time peace agreements were signed ending a number of longstanding civil wars that had been fuelled by great power rivalry. But parallel to these positive developments the end of the Cold War was also followed by an upsurge in new, and it seemed, especially atrocious civil conflicts in the Balkans, the Caucasus, and in several places in Africa. Both the scholarly community and the mass media soon shifted much of their attention from great power rivalry to the new civil conflicts.

By the late 1990's several scholars were arguing for a distinction between 'old wars' and 'new wars'. The main thrust of their arguments is provided by in-depth case study research and theory building based mainly upon observations drawn from the post-Cold War period (Duffield, 2001; Gray, 1997; Holsti, 1996; Kaldor, 1999, 2002; Kaldor & Vashee, 1998; Snow, 1996: 100-102). Based on in-depth analysis of the inner workings of these wars and more superficial comparisons with wars in the Cold War era and earlier, new war theorists identified several empirical trends: (1) *the number of civil wars is increasing*; (2) *the intensity of battle is increasing*; (3) *the number of civilians displaced in civil wars is increasing,* (4) *the number of civilians killed in civil wars is increasing*; and (5) *the ratio of civilians to military personnel killed in civil wars is increasing.*

A debate soon followed where critics pointed out that much of what 'new war' theorists identified as new in the nature of contemporary conflicts were in fact not new, calling into question the whole idea that the nature of war had changed (Cf Henderson & Singer, 2002; Kalyvas, 2001; Newman, 2004). Other scholars pointed out that some of the empirical trends identified by 'new war' theorists did not stand up to empirical scrutiny and that many alleged trends had at best sketchy underpinnings (Cf Kalyvas, 2001; Lacina, 2006; Lacina; Gledistch & Russett, 2006; Lacina & Gleditsch, 2005; Mack, 2005; Newman, 2004). However, 'new wars' theorists and their critics alike have relied mainly on case studies and anecdotal evidence. With the partial exception of Lacina

(2006) we still lack systematic tests of the propositions forwarded by the 'new wars' theorists.

The claim that the number of civil wars is increasing since the end of the Cold War has been soundly refuted. In this study we therefore focus on the 'new wars' theorists' claims about the atrociousness of 'new wars' and put these through systematic empirical tests. Specifically, we directly test three of the four claims concerning the atrociousness of 'new wars'. First we test the claim that the claim that the intensity of battle is increasing; and second that the number of civilians displaced is increasing, and third that the number of civilians killed in wars is increasing. The fourth and final claim concerning atrociousness, that the ratio of civilians to military personnel killed in wars is increasing, is not possible to evaluate directly in a systematic fashion since there is no systematic data on this aspect of wars. However, we do offer an indirect test of this proposition. If the ratio of civilian to military victims is increasing we should expect too see higher numbers of civilian deaths in conflicts with similar levels of battle intensity. Moreover, if the ratio of civilian to military deaths is higher in the 'new wars' period then ipso facto conflicts have become more threatening and dangerous to civilians which research on forced migration has consistently shown should generate higher levels of civilian displacement (Davenport; Moore & Poe, 2003; Melander, 2006; Melander & Öberg, 2006; Moore & Shellman, 2004; Schmeidl, 1997). Thus, by holding battle intensity constant and looking at the variation in civilian displacement and civilians killed we can get an indication of whether or not the ratio has changed significantly over time.

We thus evaluate the claim that new wars are more atrocious than the civil wars of the Cold War period by directly examining three dimensions of atrociousness in civil conflicts: the intensity of battle, the magnitude of violence against civilians and forced population displacement respectively. These three dimensions of atrociousness serve as the dependent variables in a series of multiple regressions that include temporal dummy variables indicating time period (Cold War/New War) as well as numerous control variables.

What we find is that battle intensity, measured as battle deaths, is significantly lower in the 'new war' period.[1] We also find that the magnitude of violence against

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[1] Bethany Lacina (Lacina, 2006) reports similar results using the same data but a different research design.

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civilians in civil conflict is significantly lower in the 'new war' period. Forced displacement of civilians follows a slightly more complicated pattern, similar to the trend in the number of civil conflicts. The number of civilians displaced in civil conflicts is significantly higher in the period 1990-1994 than in either the Cold war period or in the period 1995-1999. Thus, although civil conflicts in the period 1990-1994 generate larger flows of displaced people than civil conflicts of the Cold War, there is no consistently increasing trend in the data. On the contrary, the decrease in forced migration flow in the most recent time period is statistically significant. Finally, patterns in civilians displaced and civilians killed do not change when we control for battle intensity, which indirectly suggests that the ratio of civilian to military victims has not changed significantly since the end of the Cold War.

Thus, if anything, civil conflicts in the 'new war' period have been less atrocious than civil conflicts in the Cold war period. Needless to say, this does not mean that civil conflict in the past decade and a half has not been atrocious – it surely has been. But, civil conflicts in the 'new war' period have been no worse, and in some respects less atrocious than previous civil conflicts.

In the following section we briefly review the literature on 'new wars'. This is followed by a discussion of the claims and evidence presented in the debate about the veracity of the empirical claims made in the 'new wars' literature. We then move on to specifying our research design and elaborate on the data used in the analysis. In the penultimate section we present the results of our analysis. In the final section we sum up our findings and conclusions.

2. REVIEW OF THE NEW WARS DEBATE

Many scholars who argue for a distinction between 'old wars' and 'new wars' provide detailed and compelling descriptions of the changing nature of warfare; the evidence offered in support of their claims warrants serious consideration and empirical testing. The main thrust of their arguments is provided by in-depth case study research and theory building based mainly upon observations drawn from the post-Cold War period (Duffield, 2001; Gray, 1997; Holsti, 1996; Kaldor, 1999; Snow, 1996). Through in-depth

analysis of the inner workings of these wars and comparisons with their predecessors, the new wars are found to require an updated vocabulary and theoretical framework[2]. The existing conceptualizations of war and, by extension, the analyses dependent upon them, are thought to no longer capture meaningful distinctions in warfare (Henderson & Singer, 2002). In the last decade, the social relations underpinning these distinctions are thought to have fundamentally changed (Kaldor, 2002: 107). Thus a fresh conceptualization is put forward to describe and explain today's wars.

Several theoretical causes have been put forward to explain these fundamental changes. The Revolution in Military Affairs (RMA), which is grounded in understanding the impact of 'high' technological advancements on state military capabilities, appears to have had greater influence on earlier conceptualizations of new, or 'postmodern', war (Gray, 1997), but has since faded in light of a greater focus on wars fought among weak actors in failed or failing states, and the current emphasis on opportunities and incentives afforded to rebels in research on civil wars (Collier & Hoeffler, 2001; Fearon & Laitin, 2003). The collapse of modernity, globalization, and the demise of the bi-polar Cold War power structure are the most prominent causes cited in the debate over new wars. These in turn affect war's current form, which can be described in terms of its goals, methods of warfare, and how it is financed (Kaldor, 2002: 6). As a result, wars and the effects of wars should follow new empirical trends. In what follows, we will elaborate upon the origins of the basic conceptualization of new war, by highlighting its causes (the collapse of modernity, globalization and the end of the Cold War) and current form (goals, methods of warfare, and how it is financed). This will lead in turn to a description of its observable effects (empirical trends), which will provide the starting point for our empirical analysis of the atrociousness of new wars.

3. ORIGINS OF THE NEW WARS CONCEPT

The conceptualization of old state-based wars in which political calculus motivates leaders to construct states, armies and economies in order to wage wars of overwhelming

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[2] For example, Holsti holds that today's war trends and patterns are unexplained by "standard theoretical devices of international politics, particularly by neo-realist analysis" (Holsti, 1996: 25).

force against similarly organized opponents is thought to be a far cry from today's wars. The new wars are thought to blur the distinction between internal and external, public and private, political and economic, civilian and military and even war and peace itself (Holsti, 1996: 36-40; Kaldor, 2002: 5, 29). Occurring in failing or failed states, these are understood to be essentially nonpolitical, identity-based, organizationally deconstructed wars of aggrandizement waged among a myriad of actors unified only in their disregard for legitimacy, ideological goals and military restraint (Snow, 1996: 100-102). What is thought to have caused such a dramatic shift in the form of warfare? Three causes are offered: the failure of modernity, globalization and the end of the Cold War.

Modernity is referred to in the new wars literature primarily as the cause of the structure of old wars. In particular, old wars are associated with the rise of the modern nation-state system (Kaldor, 2002: 13-30). As portrayed in Clausewitz's *On War*, modern warfare is a conflict between organized armies on the battlefield and is a continuation of politics by other means, the logic of which tends toward extremes in warfare. The consolidation of political power, the creation of large standing armies, and the harnessing of the power of the economy via the creation of the military-industrial complex are conducted to serve this end. The collapse of state-building projects in poorer countries is thus equated with a failure of modernity itself, which is operationalized as inclusive thinking and the creation of centralized authority structures. The interplay between state-building and warfare both builds society and eventually destroys it, providing social structure and organization, but also creating the conditions for the totalizing wars of the early twentieth century. In terms of their all encompassing and genocidal tendencies, the two World Wars are the culmination of the logic of old wars, foreshadowing the coming brutality and destructiveness of new wars (Shaw, 1999). Thus, modernity contains within it the seeds of its own demise. The modern state and warfare model are understood to have remained intact through the Cold War, although already the process of globalization was increasing the erosion of its foundations.

In identifying the causes of new wars, certain scholars focus particularly on the weakening of these state structures (Duffield, 2002; Holsti, 1996). Some theorists argue that society requires a powerful agent to enforce social order, and that the undermining of the state's "gewalt" – or its capability and actual use of force – is a fundamental cause of

the rise of alternative loci of power (Brzoska, 2004: 109). Duffield (Duffield, 2002) offers an alternative to the dominant notion among new wars theorists that the changing nature of warfare is a failure of modernity, arguing instead that new wars represent a form of resistance to the global liberal economy. This 'reflexive modernity' offers an alternative political, economic and social model to protect the livelihoods of the poorest who would otherwise suffer under liberal free market economics and the current dominant global power structure whose main proponents are wealthy developed states. Nevertheless, the dominant view among proponents of the new wars concept is that today's wars are, on a fundamental level, socially 'degenerate' (Shaw, 1999).

The philosophical importance of modernity is also brought to bear in the analysis of new wars. Kaldor (Kaldor, 2002: 76-89) describes new wars as essentially a struggle between inclusive and exclusive principles of social organization: whereas identities (such as nationalism), ideas (such as national interest) and ideologies (such as liberalism, socialism, or fascism) animating old wars are thought to be inherently inclusive, the organizing principles of new wars are inherently exclusive. Examples of the latter include religion, language, ethnicity and rigid forms of nationalism[3]. The failure of the nation-state and the rise of exclusive identities are perceived as a failure of modern thought, organization and power structure. The trajectory of modern warfare thus traces the rise and fall of enlightenment philosophy. Just as the two World Wars brought about the undermining of the confidence of modern positivism, so the same period appears to signal the end of the modern state and the modern warfare model. However, despite the theoretical coherence of this analysis of war, its correspondence to reality is less obvious. An important counter point to note is that modern states have not completely failed. Quite the contrary; most modern states are thriving under globalization. In fact, the theory of democratic peace is at least partially based upon the beneficial qualities of liberal interdependence (Hegre et al., 2001; Russett & Oneal, 2001).

Globalization is presented as both the primary cause (Kaldor, 1999, 2002) and primary aspect (Duffield, 2000; Kaldor, 1999) of new wars. For Kaldor (Kaldor, 2002: 3), globalization is conceived of vaguely as the "the intensification of global interconnectedness – political, economic, military and cultural". This is seen as

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[3] On the distinction between inclusive and exclusive nationalism, see Snow, (Snow, 1996: 103).

increasing dramatically during the Cold War, albeit in the context of regional blocks rather than truly global exchanges. The ideology of Cold War politics lessened national identity barriers in the face of a common enemy, providing a common vocabulary on which to build transnational civil society. During this period, military cooperation was increasing on a dramatic scale, tying state armies into inseparable cooperative international frameworks (Kaldor, 2002: 28). Economic interactions increased through assistance programs like that of the Marshall Plan and through trade agreements such as the General Agreement on Tariffs and Trade (GATT). State sovereignty was also relinquished through membership in intergovernmental organizations such as the UN, NATO and the Warsaw Pact. In regards to Third World states in particular, the military, economic and diplomatic assistance given by the Cold War rivals in the course of global competition for influence and control within the states system deepened their reliance on the outside world. International bank lending and repayment increased dependency on Western states and led to further weakening of state capabilities through liberal structural adjustment programs (primarily regulated by the IMF). Although aimed at curbing corruption and increasing efficiency, these programs often had the effect of slashing state benefits. This, coupled with the partial deregulation and privatization of state-owned industries and a reduction in state oversight, increased both incentives and opportunities for participation in the global illicit economy. As the Cold War came to an end, it is argued, globalization exacted its final price on the legitimacy and capacity of the state.

The end of the Cold War is thought to precipitate the collapse of modernity, accelerate the process of globalization, and create an inherently less stable distribution of power in comparison to that of the previous bi-polar world order. According to Snow (Snow, 1996: 4), "The international system that evolved during the Cold War was a highly structured and, after a time, highly predictable set of relationships…there evolved a competition for influence between the superpowers that in turn created a framework within which the internal and international behavior of Third World states was regulated." With the end of the Cold War, the erosion of state sovereignty and capacity to govern in the Third World was precipitated by the withdrawal of support by the Soviet Union and the United States. In addition, the break-up of the Soviet Union resulted in the discrediting of the ideology of socialism. Kaldor (Kaldor, 2002: 82) points out that "As

post-independence hopes faded, many politicians began to appeal to particularistic tendencies." Thus, with end of the Cold War, we see a greater reliance among leaders on alternative means of social mobilization such as religion and ethnicity. What is more, the demise of the Cold War order is thought to signal the end of a stable era of bi-polar balance within the international system. This stability is thought to arise from a balance of military power, but also from restraints imposed upon warring parties. As Snow argues, "The bottom line is that the end of the Cold War has been accompanied by an apparently reduced willingness and ability to control internal violence…Governments and potential insurgents no longer have ideological patrons who provide them with the wherewithal to commit violence and then expect some influence over how that violence is carried out." (Snow, 1996: 46) Furthermore, the assistance given to states served to strengthen otherwise weak or failing states. Finally, the Cold War provided regimes with higher ideological goals and roles within the global struggle that provided a source of legitimacy. With the collapse of the Cold War, greater instability was introduced into the global system, increasing the likelihood of the outbreak of violent conflict and opening the doors to atrocities.

As a result of the failure of modernity, the corrosiveness of globalization and the end of bi-polar Cold War stability, we are thought to be witnessing fundamental changes in the social relations governing the way in which wars are fought. In this deadly nexus, "Widespread human rights abuse is not part of the collateral damage of the new wars, it is organic to how they are fought and their aims realized" (Duffield, 2002: 1051).[4] Occurring under weak or failed states, war becomes primarily a competition for resources, including the remnants of the state, the assets of the population and available inflows of materials, food and money. Military stores are ransacked, populations are terrorized and humanitarian and other forms of financial aid are taxed or siphoned off. Other sources of external funding include remittances from diaspora populations and participation in global illicit trade, including the trafficking of weapons, drugs, people and easily extractable resources. In such a situation, the state of war is preferable to peace because in war there are greater opportunities for extracting rents, and cover is provided for illegal economic activity. In short, a sort of new economic logic is built in to the

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[4] See also Kaldor (Kaldor, 2002: 100) and Snow (Snow, 1996: 111).

functioning of the war economy such that war is no longer productive, as it was in old wars, but rather destructive and 'predatory' (Kaldor, 2002: 90).

4. EMPIRICAL EVIDENCE FOR NEW WARS

Proponents of the new wars thesis subscribe to one or more of the following empirical claims regarding the nature of today's wars: (1) *the number of civil wars is increasing*; (2) *the intensity of battle is increasing*; (3) *the number of civilians displaced in civil wars is increasing,* (4) *the number of civilians killed in civil wars is increasing*; and (5) *the ratio of civilians to military personnel killed in civil wars is increasing.* Below, we will briefly review each of these claims, present previous research that relates to them and point out those claims that remain to be tested.

### *4.1. The number of wars is increasing*

Many new wars theorists argue that we are witnessing an increasing amount of armed conflict around the world (Eppler, 2002; Munkler, 2002; Shaw, 1999). This has been a commonly held assumption among social scientists and the public[5]. The usual statement of this idea is that, since the end of the Cold War, war has 'proliferated', particularly within states. Although numerous factors have been cited as causes for this proliferation, the end of the Cold War is believed to be the most fundamental, marking the turning point between old and new wars.

Despite these intuitions, an increase in the number of wars worldwide after the end of the Cold War is not born out in the available data on patterns of armed conflict. Although there was a spike in the number of intrastate conflicts in the early 1990s, since then the frequency of armed conflict has exhibited a downward trend (Gleditch et al., 2002; Harbom and Wallensteen, 2005; Mack, 2005). Figure 1 below shows the trend in armed conflicts of different type according to the Uppsala Conflict Data Program.

Figure 1: Number of Armed Conflicts by Type 1946-2004

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[5] For an earlier and well known formulation of this position, see Kaplan (Kaplan, 1994).
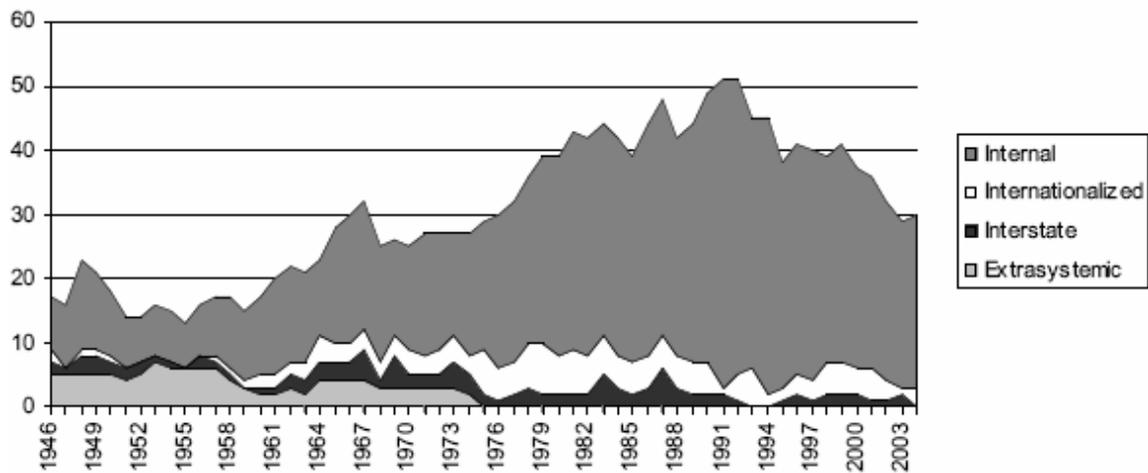
Source: Harbom and Wallensteen (Harbom & Wallensteen, 2005a)

The number of internal wars now constitutes a greater proportion of all wars, but this is due to a decrease in the number of international wars (Mueller, 1989). Regarding wars fought between states, only four of 57 active conflicts during the period 1990-2004 were interstate wars (Harbom & Wallensteen, 2005b: 83). The decreasing trend observed in the Uppsala/PRIO armed conflict dataset is reflected in other research on global political violence (Marshall & Gurr, 2005; Mueller, 2004). The peak from 1989 to 1992 reflects a peak in the number of new conflicts, associated with the break up of the Soviet Union and Yugoslavia at the end of the Cold War. The decline that follows is largely accounted for by a higher rate of conflict termination. By the end of the 1990's most of the conflicts that began in the 1989 to 1992 period, as well as a number of longstanding Cold War conflicts, had ended. At the same time, there was a general decline in the number of new conflicts from 1991 to 2003. Taken together, these trends leave us with a lower total number of ongoing conflicts (Eck; Lacina & Öberg, 2006, forthcoming).

Moreover, figure 1 may give the misleading impression that the risk of civil conflict in any given country has increased over time, as there are still more conflict in 2004 than there were at any time before the mid-1960s. This is not so. Part of the explanation for the increase in the number of conflicts from 1946 to 1992 is the increased number of independent states in the system. If we take the increased number of states in the system into account, it can be shown that "the recent decline armed conflict after the

end of the Cold War has now brought the probability of a country being in conflict to a level corresponding to the end of the 1950s and lower than at any later time during the Cold War" (Gleditsch et al., 2002: 621).

### 4.2. The intensity of battle is increasing

At the heart of the new wars concept is the claim that wars are becoming less restrained. The weakening of state control, the lack of inclusive identities, ideas and ideologies and new methods of financing war are thought to unleash greater levels of violence. Furthermore, Snow (1997) argues that the aid given by Cold War rivals restricted armed actors in Third World states and limited the viciousness of warfare. In this view, the United States and the Soviet Union would not tolerate large scale human victimization by those to whom they gave support. With the discontinuation of Cold War patronage, a resurgence of barbarity in armed conflict is thought to have been unleashed.

These claims have received strong critique based upon ethnographic and historical research and on macro-level analysis of battle-deaths data. According to Kalyvas (Kalyvas, 2001: 116), "both the perception that violence in old civil wars is limited, disciplined, or understandable and the view that violence in new civil wars is senseless, gratuitous, and uncontrolled fails to find support in the available evidence". Rather, Kalyvas finds that inadequate attention has been paid to detailed research on past wars, and that the qualities thought to be unique to new wars (greed, lack of popular support and gratuitous violence) predate the present era. Furthermore, the 'senseless' violence of new civil wars is found to be overestimated and in fact is shown to follow a strategic logic.

In terms of the effects of Cold War patronage, according to Lacina (Lacina, 2006: 286), "What seems to be more important for determining the military severity of a civil war is the availability of foreign aid and intervention." It appears that during the cold war, battle-intensity was in fact influenced by the competition between the Soviet Union and the United States, but in the opposite way as Snow (Snow, 1996) would have it. The importance of support to warring parties is not its restraining effects, but rather its facilitation of waging war. Following the end of the Cold War, the intensity of civil wars

has in fact been decreasing (Lacina, 2006; Lacina; Gledistch & Russett, 2006). Figure 2 illustrates this decline in the battle deaths worldwide.

Figure 2: Battle-Deaths Worldwide 1946-2002
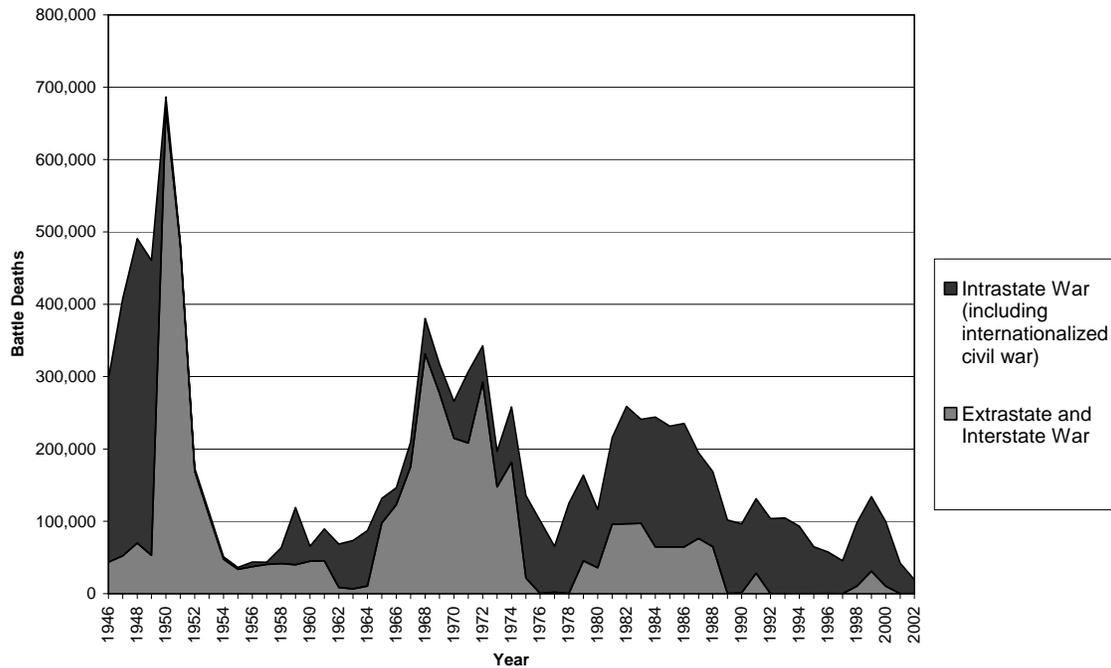
Source: Replication data for Lacina & Gleditsch, (Lacina & Gleditsch, 2005).

4.3. The number of civilians displaced or killed in wars is increasing

From the above claim that battle is less restrained in new wars, it follows that the victimization of civilians should also be increasing. With greater battle intensity, more civilians would be caught in the crossfire. In addition, the lack of restraint would mean that soldiers would be more likely to target civilians in pursuit of their political goals and economic needs. In terms of political goals, population expulsion and killing is thought to offer a means of securing political control on the basis of identity. By excluding or eliminating those who do not subscribe to the appropriate label (Kaldor, 2002: 79, 98), the territory is cleansed to secure victory in a future referendum. In addition, violence helps solidify exclusive identities by making the middle ground between opposing

factions increasingly untenable. In terms of economic needs, the population is targeted for the resources it possesses, the acquirement of which helps to support the soldiers and the war effort in general.

Lacina and Gleditch (Lacina & Gleditsch, 2005: 148) point out that there is a lack of good demographic data for measuring 'war deaths', which include "all people killed in battle as well as all those whose deaths were the result of the changed social conditions caused by the war." There are difficulties with any attempt to estimate the true human costs of war. Our aim is however more modest in that we wish to challenge two basic empirical assumptions regarding civilian victimization for which we have reliable data: civilian deaths and forced migration in armed conflicts.

Although proponents of the new wars concept have paid much attention to civilian deaths and displacement in recent wars, civilian populations were also frequently targeted for displacement and destruction in past conflicts; often on a dramatic scale. Table 1 below is a summary of the 25 worst conflicts that occurred during the Cold War measured in terms of estimated 'war deaths'. Although these figures are very rough approximations drawn from historical sources, the general idea they portray regarding the human impact of conflict over the past half century nonetheless help to put civilian victimization during war in perspective.

**Table 1: Top 25 Worst Conflicts Estimated by War-Related Deaths**

Country	Year	Civilian	Military	Total
India	1946-48	800,000	0	800,000
Columbia	1949-62	200,000	100,000	300,000
China	1950-51	1,000,000	*	1,000,000
Korea	1950-53	1,000,000	1,889,000	2,889,999
Algeria	1954-62	82,000	18,000	100,000
Tibet	1956-59	60,000	40,000	100,000
Rwanda	1956-65	102,000	3,000	105,000
Iraq	1961-70	100,000	5,000	105,000
Sudan	1963-72	250,000	250,000	500,000
Indonesia	1965-66	500,000	*	500,000
Vietnam	1965-75	1,000,000	1,058,000	2,058,000
Guatemala	1966-87	100,000	38,000	138,000
Nigeria	1967-70	1,000,000	1,000,000	2,000,000
Egypt	1967-70	50,000	25,000	75,000
Bangladesh	1971-71	1,000,000	500,000	1,500,000
Uganda	1971-78	300,000	0	300,000
Burundi	1972-72	80,000	20,000	100,000
Ethiopia	1974-87	500,000	46,000	546,000
Lebanon	1975-76	76,000	25,000	100,000
Cambodia	1975-78	1,500,000	500,000	2,000,000
Angola	1975-87	200,000	13,000	213,000
Afghanistan	1978-87	50,000	50,000	100,000
El Salvador	1979-87	50,000	15,000	65,000
Uganda	1981-87	100,000	2,000	102,000
Mozambique	1981-87	350,000	51,000	401,000

Source: Adapted from World Military and Social Expenditures 1987-88 (Sivard, 1987). * denotes missing values.

Even a tertiary review of the impact of war on civilians during the Cold War brings into serious doubt the assumption made by new wars theorists that the number of civilians killed or displaced in wars is increasing. Evidence for this claim is based primarily on in-

depth case study research of wars that occurred during the 1990s (Cf Kaldor, 1999; Kaldor, 2002; Snow, 1996). These are in turn compared with a view of old wars that is often far more superficial and removed from reality. Whereas new wars are described in detail, old wars are left in the realm of the abstract. This serves to gloss over the civilian destruction and displacement of past wars. Although interstate wars are portrayed as more civilized and restrained in the new wars literature, the fact is that these conflicts exacted massive tolls on combatants and noncombatants alike. The wars in Vietnam (1965-75) and Korea (1950-53) are two prominent examples. Throughout the twentieth century, the number of civil wars has surpassed that of interstate wars. Looking back on the Cold War period, there is no indication that past civil wars were any more restrained than they are today. Internal conflicts in places such as China (1950-51), Nigeria (1967-70), and Cambodia (1975-78) incurred massive civilian tolls during the Cold War period. Relying on data from Harff (Harff, 2003b), Mack (Mack, 2005) points out that the number of genocides and politicides have in fact substantially decreased since the end of the Cold War. Figure 3 below illustrates this trend in the number of ongoing genocides and politicides worldwide (including countries at peace).

Figure 3: Genocide and Politicide 1956–2001
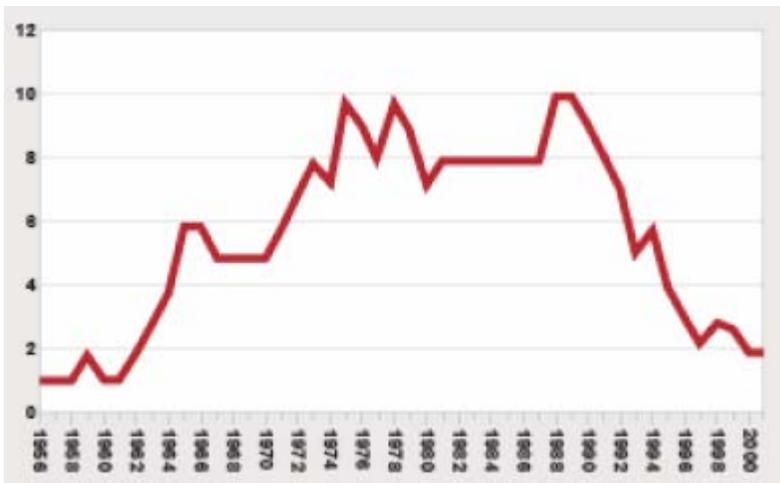
Source: Human Security Report (Mack, 2005: 41). Figure based upon Harff (Harff, 2003b).

Harff defines genocides and politicides as the destruction, in whole or in part, of a communal, political, or politicized ethnic group (Harff, 2003b: 58). In a study of the risk of genocide in civil war, she identifies the risk factors for genocide to include political upheaval, prior genocides/politicides, autocratic regimes, the exclusionary ideology of elites, and elites representing an ethnic minority (Harff, 2003b: 70). On the other hand, international economic interdependence reduces the likelihood of genocide in civil wars. The former correspond well with the concept of new wars in terms of upheaval, past genocide, exclusionary ideology and elites manipulating of ethnic identity. However, on the basis of Harff's study, these apply to past conflicts as well as to recent conflicts. What's more, the factor Harff identifies as decreasing the likelihood of genocide and politicide is precisely what new wars theorists attribute as a primary cause of new wars; namely, international interdependence. We will employ this data on trade openness in our regressions in order to capture the direct human toll of armed conflict.

It is difficult to generalize from a handful of cases to global trends. In order to make this connection, data on displacement worldwide is also cited by proponents of the new wars concept. Kaldor (Kaldor, 2002: 101) points to UNHCR (2000), which claims that the total number of displaced persons has increased dramatically over the past quarter century. Looking at the data by decade and region, there is a sharp rise in the number of refugees, particularly since the mid 1970s. According to Kaldor, UNHCR estimates that the number of refugees increased from 2.4 million[6] in 1975 to 14.4 million in 1995. The figure of 5.4 million[7] internally displaced people is also offered as a supplement to the latter, although it is actually for the year 1999, and there are no other figures offered with which to compare it. To further strengthen support her claims, Kaldor refers to USCR (2000) for another estimate, noting the number of refugees increased from 22 million in 1980 to 38 million in 1995, half of which were internally displaced.

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[6] Kaldor misquotes this figure (mistakenly using the figure for 1974), which is actually 2.99 million (UNHCR, 2000).
[7] Kaldor combines two categories ('Internally Displaced' and 'Returned IDPs') for this estimate. However, the figure for those Internally Displaced given by UNHCR would be more appropriate, as Returned IDPs are no longer displaced but remain 'of concern' to UNHCR for two years thereafter. The proper figure is actually 4 million (UNHCR: 309).

Newman (Newman, 2004: 182) rightly points out that this dramatic increase in statistics on refugees and internally displaced people may be due to a lack of reliable data for earlier historical periods. In addition, the increasing visibility of the human costs of conflicts in recent years has increased the amount of attention paid to the issue of displacement. What is more, the total stock of displaced people may continue to accumulate even if the 'new wars' generate significantly fewer new forced migrants relative to the civil conflicts of the Cold War era if fewer people return than flee their homes. Displaced people often cannot return for many years and a large portion of the total number of refugees and internally displaced people of the world during the years following the end of the Cold War were in fact forced to leave their homes while the Cold War was still ongoing. We therefore argue that the relevant comparison is between how many new displaced persons that different conflicts generate.

4.4. The ratio of civilians to military personnel killed in wars is increasing

Another important empirical claim regarding the changing nature of war also relates to the targeting of civilians. Whereas old wars are thought to distinguish between combatants and noncombatants, new wars are understood to blur this distinction. In fact, combatants are thought to prefer to target civilians. Snow (Snow, 1996: 111) asserts that "A distinguishing characteristic of these conflicts is the extent to which unarmed and otherwise innocent civilians are the major, if not the sole, targets of the military campaigns being waged." As a result of this shift towards targeting civilians, Kaldor (Kaldor, 2002: 100) claims there has been a "dramatic increase in the ratio of civilian to military casualties. At the beginning of the twentieth century, 85-90 percent of victims in war were military. In World War II, approximately half of all war deaths were civilian. By the late 1990s, the proportions of a hundred years ago have been almost exactly reversed, so that nowadays approximately 80 percent of all casualties in wars are civilian." Similar figures have been repeated among researchers and circulated in the media for many years.

Lacina and Gleditsch (Lacina & Gleditsch, 2005: 146) note that other similar estimates of civilian fatalities even reach as low as 5%. However, they argue that these figures are the result of a misinterpretation of official military statistics and the

application of categorizations ill-suited to research on civil wars. The figure of less than 15% civilian deaths in war at the beginning of the twentieth century is far lower than the best estimates available from historians of war. Indeed, a recent report by Margareta Sollenberg (2006) shows that the available data collected by historians does not support any trends over time in the ratio of civilian to military deaths. The ratio of civilian to military deaths in a typical civil conflict is about 50/50. There is some variation across conflicts but relatively few outliers, and the pattern is consistent over time. Moreover, some of the conflicts most often used to exemplify the alleged trend in the 'new wars' literature do not hold up to scrutiny. Estimates of civilian to military deaths provided by historians and demographers are similar for World War I, World War II, and the war in Bosnia and Herzegovina 1992-1995. They are all fairly typical with ratios close to 50/50.

5. DATA AND RESEARCH DESIGN

We evaluate the claim that the new wars are more atrocious than the civil wars during the Cold War era by examining three dimensions of atrociousness: battle intensity, civilian casualties, and civilian displacement. These three dimensions of atrociousness serve as the dependent variable in three separate multiple regressions that include temporal dummy variables as well as numerous controls on the right hand side.

We take into account all intrastate armed conflicts identified in the UCDP/PRIO Armed Conflict dataset (Gleditsch et al., 2002; Harbom & Wallensteen, 2005a). Our two most important indicators of atrociousness – genocide/politicide and forced migration flows – are available aggregated for each country in a given year. This means that although several different conflicts may be fought in one country in a given year there is no separate information available on genocides/politicides and forced migration flows associated with the individual conflicts. Our unit of analysis is thus the country-in-intrastate-armed-conflict-year, i.e., each country that is involved in at least one intrastate armed conflict contributes one observation for every year with active conflict. There are

736 observations from the intrastate armed conflicts of the Cold War era (1946-1989) and 438 observations of new war-years (1990-2002).[8]

Our first dependent variable is battle intensity. To measure battle intensity we use data on the yearly number of battle deaths in a country involved in intrastate armed conflict. The casualty figures are adapted from Lacina and Gleditsch and include "all people, soldiers and civilians, killed in combat" (2005: 148). This measure reflects the scale, scope and nature of military engagements sooner than the atrociousness per se. Nevertheless since civilians killed in military operations are counted the battle death measure will indirectly capture part of the atrocities of civil war. We believe, though, that the other two dimensions of atrociousness that we examine, namely genocide/politicide and forced migration flows, more directly and fully capture the degree to which civil wars are atrocious. Since battle deaths is an excellent measure of the intensity of combat we will also enter this variable as a control variable when examining genocide/politicide and forced migration flows. In that way we will ensure that any temporal effects (Cold War era versus New Wars) on atrociousness are not conflated with variations in the intensity of combat. This variable is available for the years 1946-2002.

The second dependent variable is the number of civilians intentionally killed in civil conflicts. To measure this aspect we use data on genocide/politicide as defined and coded by the State Failure project (http://globalpolicy.gmu.edu/pitf/). Genocide/politicide is very broadly conceived of and includes: "massacres, unrestrained bombing and shelling of civilian-inhabited areas, declaration of free-fire zones, starvation by prolonged interdiction of food supplies, forced expulsion ('ethnic cleansing') accompanied by extreme privation and killings" (Marshall; Gurr & Harff, 2001: 15). In civil conflicts violence by either the government side or the rebels is included. Only unarmed civilian victims are counted, not combatants. The temporal domain of this variable is 1955-1996.

The third dependent variable is civilian displacement in civil conflict. To measure this we use data on forced migration flows, i.e., the net flow of refugees and internally displaced people from a country in a given year. This is the most commonly used measure in the research on forced migration and is obtained by summing the number of

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[8] Because of missing data on the different dependent variables the number of observations used in the analyses is lower.

refugees and internally displaced persons from each country each year, subtracting the sum for the previous year and truncating the negative values at zero (Melander, 2006; Moore & Shellman, 2004)have data series with good coverage for both refugees and internally displaced people for the years 1980-1999.

5.1. Indicating 'New Wars'

The explanatory variables that we set out to test are temporal dummies that indicate whether a particular observation comes from the Cold War era 1946-1989, or the new war years 1990-2002. In some tests we disaggregate the time dimension further by employing separate temporal dummies indicating shorter time spans, e.g., five-year periods.

5.2. Statistical Controls

Since our purpose is the examine the atrociousness of new wars relative to earlier intrastate armed conflicts we do not aim to maximize the explained variation in our three dependent variables. Consequently, there is no need to enter additional independent variables just because they might have some influence on any of the dependent variables. What is relevant to control for is instead possible confounding factors that might systematically differ between the Cold War era and the new wars era, and unless controlled for therefore may distort our findings.

We propose four main control variables that may have this role: population size, economic development, democracy, and involvement in armed conflict with other countries.

Assuming that all other factors combine into a constant risk that each individual should be killed in battle, massacred or forced to flee his or her home, more populous countries should give rise to larger numbers of battle deaths, victims of genocide/politicide and forced migrants. The population of a country is consequently a standard control variable in the research explaining battle deaths and forced migration. This variable is also changing systematically over time since most countries, especially poorer countries where most of the intrastate conflicts rage, grow in population size. We

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will enter the log-transformed population as a control variable for all three dependent variables.

Similarly, the level of economic development of a country is a variable that is often found to influence different forms of collective violence, e.g. civil war, forced migration and human rights abuse. Generally, poorer countries are more prone to experience societal upheavals, and to be worse affected by such upheavals, than richer countries (Collier et al., 2003). Although a handful of countries have had negative growth, most countries in the world have exhibited considerable economic growth over time. We will control for the level of economic development, using log-transformed gross domestic product per capita as our indicator. In addition, we add a squared term when examining battle deaths and genocide/politicide so as to capture a possible curvilinear relationship between the level of economic development and these forms of collective violence. It has been suggested that the pains of modernization may heighten the risk of genocide/politicide and produce more intense violent struggles in society (Collier et al., 2003). We aim to take this possibility into account by way of controlling for a curvilinear effect of the level of economic development.

The third aspect that we will control for in relation to all three dependent variables is the level of democracy. Previous research as found that democracy is associated with less lethal intrastate armed conflicts (Lacina, 2006), less genocide/politicide (Harff, 2003a) and less forced migration (Davenport; Moore & Poe, 2003; Melander & Öberg, 2006; Moore & Shellman, 2004; Schmeidl, 1997). When examining battle deaths and genocide/politicide we will also add a squared term of the democracy measure so as to capture possible curvilinear effects. This is because some studies have suggested that genocide/politicide and civil war is more likely in semi-democracies roughly in the middle of the democracy scale (e.g., Fein, 1995; Hegre et al., 2001). The measure of democracy we employ is in line with most studies in the field: Polity2. This index was created by the Polity Project, Phase IV (Marshall & Jaggers, 2000), and we use a variant that has been compiled by Gleditsch (Gleditsch, 2003) so as to conform to the list of independent states by Gleditsch and Ward (Gleditsch & Ward, 1999).[9] This variable measures the level of institutional democracy, and ranges from –10 (least democratic) to

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[9] This list of states is compiled so as to be particularly suitable for time series analysis.

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10 (most democratic). We also add a dummy variable indicating regime collapses and transitions, so as to account for the potentially peculiar effects of these country years.[10]

Finally, for all three dependent variables we also control for the intensity of involvement in armed conflict with other countries. It is reasonable that intrastate armed conflict may become more atrocious if the afflicted country simultaneously is waging war against an external enemy, perhaps because the regime is under more grave threat. We must also control for the possibility that forced migration is driven primarily by the fighting against other countries. To capture this aspect we count for each country involved in intrastate armed conflict the number of battle deaths claimed in all armed conflicts with other countries in a given year. A few states involved in intrastate armed conflict are in a given year involved in several external conflicts (e.g. Israel in 1973 against Egypt and against Syria) and we then add the battle deaths for all conflicts. The data on battle deaths comes from Lacina and Gleditsch (Lacina & Gleditsch, 2005). Interstate armed conflicts are becoming increasingly rare, making the intensity of involvement in armed conflict with other countries a suitable control variable.

In addition to these common controls we add a few controls when examining one or two of the three independent variables. When the intensity of battle is at issue we also control for the duration of civil conflict. This control reflects the number of consecutive preceding years that civil conflict has been active in the country in question in a given year. We also add the square term of this count variable so as to capture possible curvilinear effects of the duration of civil conflicts on the intensity of battle. Conflict duration and its square term are also included when we turn to genocide/politicide.

A second control variable that we use for both battle intensity and genocide/politicide is the time since the last major change in the political institutions of a country. Following the Polity Project definition, we conceive of a major change in political institutions as a three-point shift in the Polity score over a period of three years or less, or the end of a transition period. This variable is intended to reflect the degree of

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[10] In Polity2 years coded –88, indicating periods of transition during which new institutions are established, are prorated across the span of the transition so as to avoid systematically losing data because of missing values. Years coded –77, indicating complete collapse of central political authority, are for the same reason recoded to a "neutral" score of 0. For example, country X has a POLITY score of -7 in 1957, followed by three years of –88 and, finally, a score of +5 in 1961. The change (+12) would be prorated over the intervening three years at a rate of per year, so that the converted scores would be as follows: 1957 –7; 1958 –4; 1959 –1; 1960 +2 and 1961 +5. See http://www.cidcm.umd.edu/inscr/polity/index.htm.

stability in the political institutions in a country afflicted by civil conflict. Previous research has suggested that heightened risks of civil war and genocide/politicide accompany political upheavals. Since there was a wave of regime transitions in connection with the end of the cold war this seems like a relevant control.

When examining genocide/politicide we also include a measure of trade openness that previous research has found to be associated with lower risks of genocide/politicide. Trade openness is defined as total trade (imports plus exports) as a percentage of GDP. It is argued that this variable reflects "state and elite willingness to maintain the rules of law and fair practices", as well as capacity for "averting and managing political crises"(Harff, 2003b: 65), and that these traits in turn make genocide/politicide less likely. Trade openness has generally increased over time in most countries hence we include it as a control.[11]

Finally, when forced displacement of civilians comes to the fore in the analysis we also control for the geographical scope of fighting and the extent to which urban centres are affected. We use two indicators from the State Failure Project (Goldstone et al. 2000) measuring the scaled proportion of a country affected by ethnic war and revolutionary war respectively. The scale for both indicators ranges from 0-5 (0=no conflict), and the area affected ranges from <10% of the area and no significant cities affected (1) to >50% of the area affected (5). In previous studies we found that the geographical scope of fighting is a major cause of forced migration, and that when this factor is taken into account even the intensity of fighting becomes insignificant for explaining forced migration flows (Melander & Öberg, 2004, 2006).

5.3. Temporal Dependence

Many intrastate armed conflicts are active for two or more consecutive years. We want to take into account the possibility that the level of atrociousness in the present year may be related to the level the immediately preceding year if the country in question was afflicted by active intrastate armed conflict also in the preceding year. For all three dependent variables we include the dependent variable lagged one time unit (i.e. one year) so as to minimize potential problems with such dependency. The control presented above

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[11] Trade openness has also been found to be negatively related to the risk of civil war (de Soysa, 2002).

reflecting the duration of intrastate armed conflict captures additional temporal elements that may differ systematically between the Cold War era and the New Wars.

Our previous research has identified several additional controls relating to temporal dependence in forced migration that are relevant when this dependent variable is concerned (Melander & Öberg, 2006). When examining forced migration we will include these controls. For further details we refer the reader to our previous article.

5.4. Design

We use different multiple regression techniques that are chosen so as to suit the character of respective dependent variable. In our dataset several countries contribute more than one observation (if the country in question has been involved in intrastate armed conflict more than one year). We take this unbalanced panel structure of the data into account in various ways. Our first dependent variable is amendable to ordinary least squares regression but in order to take the panel structure into account we use panel corrected standard errors (and include a lagged dependent variable) as recommended by Beck and Katz (1995). Our second dependent variable is an ordinal scale with eleven unique steps. We analyze this variable using ordinal pooled logistic regression and cluster on country identity. If we instead consider the second dependent variable to be equivalent to an interval scale and use panel corrected standard errors (together with the lagged dependent variable) almost identical results are obtained. The third dependent variable is an event count ranging from zero to some positive integer. The events are most likely not independent in that the decision of one person to flee is not independent of other people's decisions to stay or flee. For data with these properties a negative binomial model is appropriate (King, 1989: 126; Long, 1997: 230-236), and in line with recent studies we use a zero-inflated negative binomial regression model (ZINB) to estimate our models. For all three dependent variables we lag the independent variables one year.

6. ANALYSIS AND FINDINGS

In this section we present the trends in the data that we use to examine the atrociousness of the 'new wars', and employ multiple regression techniques to test if the advent of the New War era has made civil conflicts significantly more atrocious. For all three dependent variables we present both a complete model with the full set of control variables included and a trimmed model. We derive the trimmed model by way of stepwise dropping the least significant variables until all remaining variables are significant at the 0.10 level or better.

6.1. The intensity of battle

Figure 4 below illustrates the trend in average battle deaths per country for countries that are involved in at least one intrastate armed conflict.[12] The years 1946-1949 are excluded so as to make the variation in later decades stand out more clearly. During the excluded years the extremely bloody Chinese civil war caused between 200 000 and 350 000 battle deaths each year, and if included these high numbers would dwarf the variation in subsequent years.

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[12] For example, in 1955 only four countries had active intrastate armed conflicts: Argentina (900 deaths); Israel (143 deaths); Myanmar (600 deaths); and Vietnam (1000 deaths). The value illustrated by the 1955 bar is thus (900+143+660+1000)/4=676.

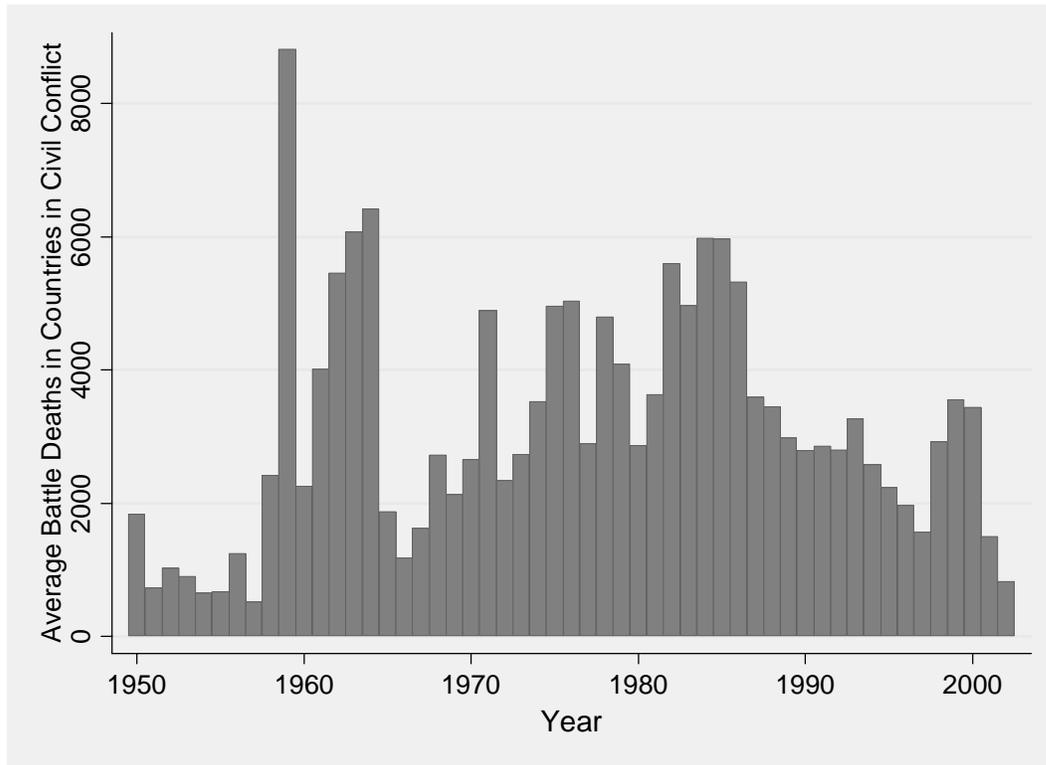**Figure 4: Average Battle Deaths in Countries in Civil Conflict, 1950-2002**

Figure 4 immediately reveals that the numbers of battle deaths in countries ravaged by civil conflicts if anything was higher during the Cold War era than in the 'new wars'. It should also be pointed out that we adhere to the classification in the dataset compiled by Lacina and Gleditsch (2005) and consequently consider the Korean and Vietnam wars to be interstate wars. Had these extremely bloody conflicts been counted as (internationalized) civil wars the lethality of the Cold War conflicts would have been even more pronounced.

Despite this telling graph we will move on to a multiple regressions analysis in order to examine if the 'new wars' are significantly bloodier if the set of control variables is taken into account. In Table 2 below we present our findings regarding the intensity of battle measured as the battle related fatalities.

Table 2. Battle intensity

Battle Intensity	(1) Complete Model	(2) Trimmed Model
Civil conflict battle intensity$_{t-1}$	.74***	.76***
	(.05)	(.19)
New war	-756.42*	-937.67**
	(452.60)	(426.37)
Civil conflict duration	3.02	
	(68.41)	
Civil conflict duration^2	.11	
	(1.15)	
Log of population$_{t-1}$	112.93	
	(175.89)	
Log of GDP/Capita.$_{t-1}$	-2392.18	
	(1529.33)	
Log of GDP/Capita^2.$_{t-1}$	162.62	
	(109.13)	
Regime type$_{t-1}$	-2.10	
	(6.33)	
Regime type$^2_{t-1}$	-74.24***	
	(27.93)	
Regime transition or collapse$_{t-1}$	792.06	
	(1048.39)	
Regime age$_{t-1}$	-7.59	
	(7.33)	
Constant	8562.30*	1179.08
	(4731.82)	(766.03)

*** p<.01, ** p<.05, * p<.10 (two tailed test)
Panel corrected standard errors in parenthesis
OLS regression

The results presented in Table2 show that armed conflicts in the post-Cold War period produce significantly fewer battle related casualties than civil conflicts in the Cold War period. This result holds when we control for previous intensity, the duration of the conflict, the population of the country, income per capita, political system, political transitions, and the age of the polity. Thus, evidence does not support the idea that civil conflicts of the post-Cold War era are bloodier, or more intense that than civil conflicts in the previous era. In fact, evidence supports the opposite claim: civil conflicts in the post-Cold War era are significantly less intense than civil conflicts in the Cold War era. These findings are in line with the findings presented by Bethany Lacina (Lacina, 2006) which shows that wars that started in the post-Cold War period have less battle related deaths than war during the Cold War period.

The end of the super power rivalry was followed by a significant reduction in military and economic aid to governments and rebels in civil conflicts around the world. This most likely reduced the ability of the conflict parties to inflict damage and sustain fighting at high levels of intensity, while also increasing the local costs of doing so. Thus, contrary to Snow's (1996: 46) suggestion, evidence indicates that rather than tempering the violence in the Cold war period, the military and economic aid supplied by super power rivalry increased the intensity of civil conflicts during the Cold War.

While regime type was significant in the complete model, indicating that more democratic countries in civil conflict suffer fewer battle deaths, this variable loses in significance as other variables are dropped, and it does not make it to the trimmed model. It may be interesting to note, however, that Regime Type and Log of GDP/Capita are jointly significant if added to the trimmed model. All the same, the inclusion or exclusion of control variables does not affect the conclusion that 'new wars' are less intense in terms of battle deaths than the civil wars that wrought havoc during the Cold War.

6.2. Number of civilians killed

Figure 5 shows the trend in average genocide/politicide level per country for the countries that had at least one active intrastate armed conflict for the years 1955-1996.

Figure 5: Average Genocide/Politicide Level in Countries in Civil Conflict, 1955-1996
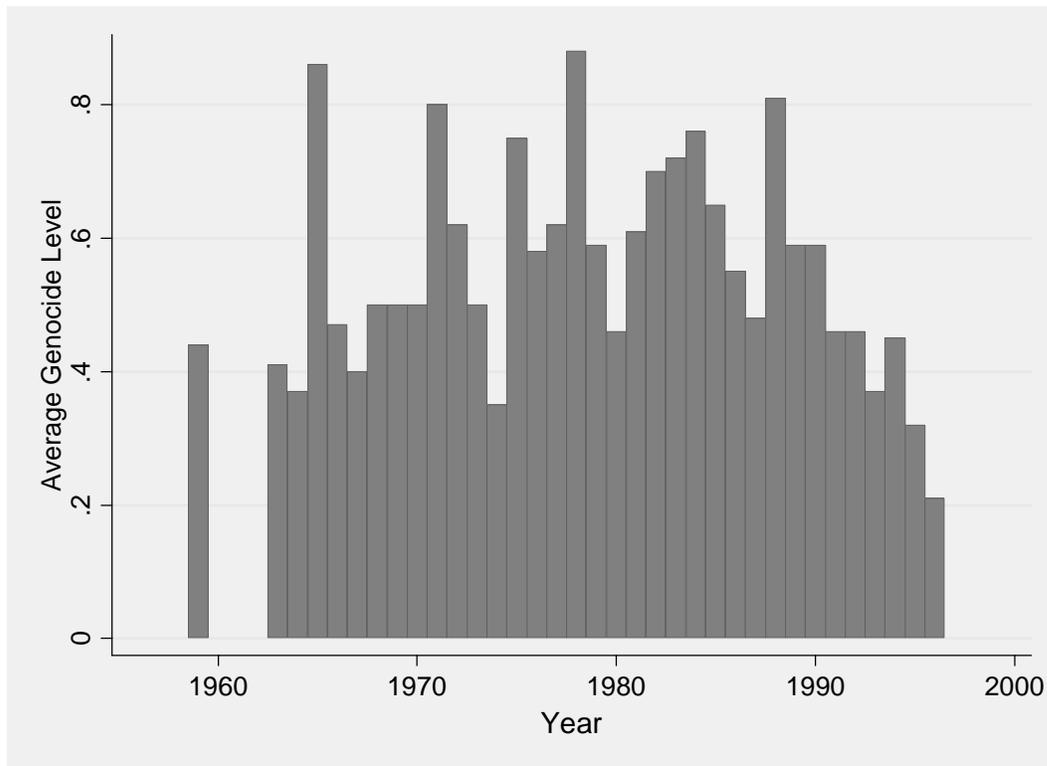
Again it is immediately apparent from the graph that the civil conflicts during the Cold War era if anything were more atrocious in terms of violence against civilians than the 'new wars' of the post-Cold War period. In Table 3 below we present our multiple regression results regarding the magnitude of violence directly targeting civilians.

Table 3. Violence targeting civilians

Civilian casualties	(3) Complete Model	(4) Trimmed Model
New war	-.49 (.36)	-.62* (.35)
Civilian casualties$_{t-1}$	2.21*** (.23)	
Civil conflict battle intensity$_{t-1}$	6.49e-6 (.00)	
International conflict battle intensity$_{t-1}$	1.38e-7 (.00)	
Civil conflict duration	.03 (.04)	
Civil conflict duration^2	-4.30e-4 (7.00e-4)	
Log of population$_{t-1}$	.09 (.18)	
Log of GDP/Capita.$_{t-1}$	1.66 (1.73)	
Log of GDP/Capita^2.$_{t-1}$	-.12 (.13)	
Regime type$_{t-1}$	-.04 (.02)	-.04** (.02)
Regime type$^2_{t-1}$	-.01** (.01)	-.01** (.00)
Regime transition or collapse$_{t-1}$	-.54 (.35)	
Regime age$_{t-1}$	-.01 (.01)	
Trade openness$_{t-1}$	-.03 (.03)	
Cut point 1	8.94 (6.02)	2.50 (.35)
Cut point 2	9.12 (6.04)	2.67 (.30)
Cut point 3	9.67 (6.09)	3.19 (.29)
Cut point 4	10.22 (6.09)	3.72 (.29)
Cut point 5	10.94 (6.10)	4.42 (.35)
Cut point 6	12.09 (6.12)	5.49 (.55)
Cut point 7	12.20 (6.15)	6.57 (.67)
Cut point 8	15.17 (6.14)	8.39 (.87)
Cut point 9	17.33 (6.31)	10.23 (1.10)
Cut point 10	17.90 (6.32)	10.67 (1.29)

*** p<.01, ** p<.05, * p<.10 (two tailed test)
Robust standard errors adjusted for clustering on country in parenthesis
Ordinal logit regression

In parallel to the results regarding battle intensity, we find the post-Cold War era significantly less atrocious than the Cold War Era. Thus, the empirical evidence is again contrary to what 'new wars' theorists have argued.

The only control variable that is retained in the trimmed model is Regime Type and its squared term. Together these two variables capture a curvilinear relationship between the level of democracy and the propensity of conflict involved in civil conflict to experience genocide/politicide. The risk is highest for semi-authoritarian states near the middle of the democracy scale, lower for countries completely lacking in democracy, and lowest for the most democratic countries.

6.3. Number of civilians displaced

Figure 6 illustrates the trend over the years 1981-1999 in the average magnitude of forced migration flows per country for countries in civil conflict. In addition to the bars marking the average number of forced migrants we have added a line that reflects the linear trend and a curve that represents the curvilinear association between the magnitude of forced migration and year.

Figure 5 suggests that civilian displacement in civil conflict peaked around the end of the cold war, a pattern that agrees nicely with the trend in the number of ongoing civil conflicts in the world that reached an all-time high in 1992. It is evident that the atrociousness of the 'new wars' as reflected in forced displacement of civilians will be heavy influenced by whether or not the peak year 1990 is counted as part of the Cold War era or as part of the New War era. Given the established peak in intrastate armed conflicts around the end of the cold war a more disaggregated analysis of the influence of time is needed. We divide our data into the four periods 1981-1984, 1985-1989, 1990-1994, and 1995-1999, and use dummy variables indicating these four periods when we move on to the regression analysis.

Figure 6: Average Forced Migration Flow in Countries in Civil Conflict, 1981-1999
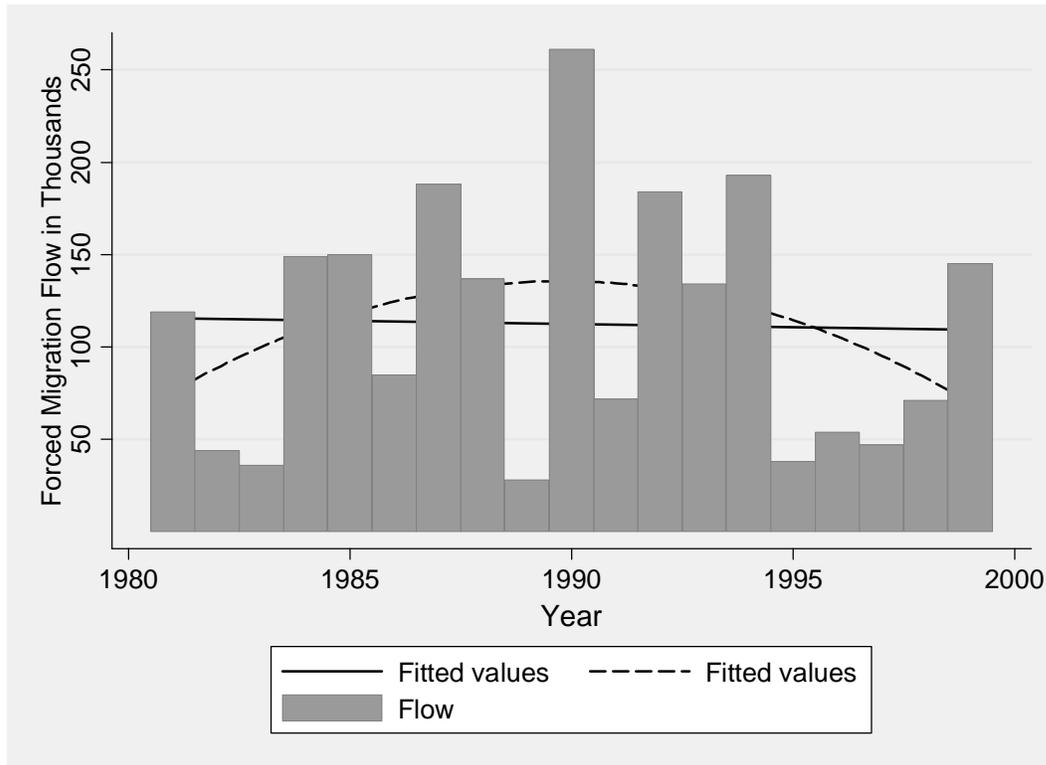

Table 4 shows the multiple regression result when forced displacement of civilians is the dependent variables and the time dummies are entered together with the set of control variables. The reference category is the dummy indicating the years 1990-1994, which consequently is left out. Note that the zero-inflated negative binomial model consists of an inflation equation in the lower part and a count equation in the upper part of Table 4. The inflation equation is a logit regression of the independent variables on the probability that there is *no* flow of forced migration in a given year. The count equation is a negative binomial regression of the independent variables on the net number of forced migrants flowing out of a country in a given year (after adjusting the mean structure for zero-inflation). In the the count equation (upper part of Table 4) we report incidence rate ratios (IRR). IRR represents the change in forced migration flow given a unit change in the independent variable, holding all others constant. Thus, an IRR of 1.0 indicates no change in the expected count of forced migrants, an IRR greater than 1.0 indicates an increase in the expected count, and an IRR lower than 1.0 indicates a decrease in the expected count.

Table 4. Civilian displacement

Number of civilians displaced	(5) Complete Model	(6) Trimmed Model
Count equation		
Number of civilians displaced$_{t-1}$	1.00	1.00
	(4.87e-7)	(4.95e-7)
Cold war period (1981-1984)	.29***	.33***
	(.09)	(.10)
Cold war period (1985-1989)	.46**	.51**
	(.16)	(.17)
New war period (1995-1999)	.41***	.43***
	(.13)	(.14)
Accumulated stock of civilian displacement	1.00	1.00
	(1.61e-7)	(1.56e-7)
Years with civilian displacement	1.07	
	(.08)	
Years with no civilian displacement	.99	.97
	(.04)	(.04)
Civil conflict battle intensity$_{t-1}$	1.01***	1.01**
	(.00)	(.00)
International conflict battle intensity$_{t-1}$	1.01**	1.01***
	(.00)	(.00)
Area affected by ethnic civil conflict$_{t-1}$	1.23***	1.19**
	(.10)	(.08)
Area affected by revolutionary civil conflict$_{t-1}$	1.19**	1.19***
	(.07)	(.07)
Regime type	.98	
	(.02)	
Regime transition or collapse$_{t-1}$	1.56	1.59*
	(.45)	(.42)
Log of GDP/Capita$_{t-1}$	.62**	.60***
	(.12)	(.08)
Log of population$_{t-1}$	1.03	
	(.16)	

Table 4 Continued		
Likelihood of no civilian displacement	**(5) Complete Model**	**(6) Trimmed Model**
Inflation equation		
Number of civilians displaced$_{t-1}$	5.99e-7	6.14e-7
	(4.25e-7)	(4.03e-7)
Cold war period (1981-1984)	.43*	.53*
	(.30)	(.30)
Cold war period (1985-1989)	.51**	.55**
	(.27)	(.27)
New war period (1995-1999)	.69**	.67**
	(.32)	(.32)
Accumulated stock of civilian displacement	1.52e-7*	1.87e-7**
	(9.00e-8)	(8.64e-8)
Years with civilian displacement	.02	
	(.07)	
Years with no civilian displacement	.40***	.42***
	(.13)	(.10)
Civil conflict battle intensity$_{t-1}$	-2.45e-5	-2.55e-5
	(1.79e-5)	(1.78e-5)
International conflict battle intensity$_{t-1}$	-2.92e-6	-8.46e-7
	(4.19e-6)	(3.01e-6)
Area affected by ethnic civil conflict$_{t-1}$	.09*	.07
	(.05)	(.05)
Area affected by revolutionary civil conflict$_{t-1}$	-.07	-.08
	(.06)	(.06)
Regime type	-.04*	
	(.02)	
Regime transition or collapse$_{t-1}$	.13	.08
	(.32)	(.28)
Log of GDP/Capita$_{t-1}$	.01	-.12
	(.14)	(.12)
Log of population$_{t-1}$	.07	
	(.09)	
Spline 1	.00	.00**
	(.00)	(.00)

Spline 2	.01	.01*
	(.01)	(.01)
Spline 3	-.01	-.01*
	(.01)	(.01)
Constant	-1.87	-.24
	(1.56)	(.97)
lnAlpha	-1.21***	-1.21***
	(.04)	(.04)

*** p<.01, ** p<.05, * p<.10 (two tailed test)
Robust standard errors adjusted for clustering on country in parenthesis
Zero-inflated negative binomial regression

Table 4 shows that there indeed is a statistically significant peak in forced migration in the 1990-1994 period that encompasses the ending of the Cold War. All the three time periods 1981-1984, 1985-1989, and 1995-1999 are associated with significantly smaller flows of forced migrants in civil conflict compared to the reference period. Most importantly, the decrease in civilian displacement in civil conflict in the most recent period 1995-1999 is highly significant and substantial in terms of impact.

There is thus no support in the data for the proposition that civil conflict in the post-Cold War era as a whole generates significantly larger flows of forced displacement. Like the number of civil conflicts, the flows of forced migration peaks in the early 1990s. Compared to earlier and later periods (1981-1989 and 1995-1999) civil conflicts in the period 1990-1994 generate significantly larger flows of forced migrants. The peak in 1990-1994 is probably related to the break-up of multi-ethnic states and empires, with the concomitant re-drawing of international borders rather than a fundamental transformation of the nature of civil conflicts. Earlier historical periods with similar dismantling of empires and re-drawing of borders have also witnessed extraordinary bouts of forced migration (e.g. India in 1947, Germany immediately after world War II, the Ottoman empire after World War I). Thus, the peak in 1990-1994 notwithstanding, there is no increasing trend over time following the end of the Cold War. Our findings thus contradict the 'new wars' argument also when forced displacement of civilians is concerned.

The significant control variables in the trimmed model show that the intensity and geographical scope of the fighting drives forced migration flows in civil conflicts. Instances of regime collapse or transition are also associated with larger flows, whereas more economically developed countries exhibit smaller flows of forced migrants.

6.4. Ratio of civilian to military deaths

As noted in the introduction, we lack systematic data on the ratio of civilian to military deaths so we cannot test these 'new war' claims directly. However, we do have systematic data on battle deaths, on civilians killed, and on civilian displacement. The data on battle deaths includes both military and civilians killed in battle, but it does not include deaths from violence directed directly at civilians (e.g. massacres, murderous ethnic cleansing, or genocidal violence). If the ratio of civilian to military victims have changed over time, as the 'new war' literature suggests, then we should be able to see this indirectly by holding battle deaths constant and looking for variations in civilian displacement and civilians killed.

First, turning to our results in Tables 3 we see that when we hold battle intensity constant, the trend in civilians killed is decreasing. This suggests that, if anything, the ratio of civilian to military casualties is lower in the 'new wars' period than in the Cold War period. Second, as noted earlier, if the ratio of civilian to military deaths is higher in the 'new wars' period then ipso facto conflicts have become more threatening and dangerous to civilians which research on forced migration has consistently shown should generate higher levels of civilian displacement (Davenport; Moore & Poe, 2003; Melander & Öberg, 2004, 2006; Moore & Shellman, 2004; Schmeidl, 1997). The results in Table 4 show that, controlling for battle intensity the flows of forced migrants in civil conflicts peak in 1990-1994, and then substantially and significantly decline. Thus, we conclude that there is no support for the claim that the ratio of civilian to military casualties has increased significantly in the 'new wars' period. It should be noted that the evidence underlying this conclusion is only indirect, but it seems unlikely that the ratio of civilian to military casualties have changed significantly without leaving any trace in the magnitude of civilians killed or in the numbers of forced displacement when we hold battle intensity constant.

7. SUMMARY AND CONCLUSIONS

We hope that the evidence and analysis presented above will help dispel some of the remaining myths about 'new wars'. Having said that, we do not wish to throw the baby out with the bath water. The 'new wars' literature has provided insights into to the nature of civil conflicts, and has helped dispel some earlier myths e.g. about rebels and their motivations. It is just that it does not seem to be the nature of civil conflict that has changed so much as the way we look at it. One thing that may have changed with the end of the Cold War is conflict economies. Foreign patronage, to rebels and governments alike, has declined markedly since the end of the Cold War (although the 'war on terror' may bring some of it back). This has forced conflict parties to rely more on alternative sources of income, such as rebel taxes, kidnappings, 'lootable' resources, illicit drugs and the like. Again, these forms of funding are not new, even if – for a period – it was to some extent replaced by more convenient forms of funding generated by the superpower rivalry of the Cold War.

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