

Postprint

This is the accepted version of a paper published in *European Journal of International Relations*. This paper has been peer-reviewed but does not include the final publisher proof-corrections or journal pagination.

Citation for the original published paper (version of record):

Melander, E., Öberg, M., Hall, J. (2009)

Are 'New Wars' More Atrocious?: Battle Severity, Civilians Killed and Forced Migration Before and After the End of the Cold Wa.

European Journal of International Relations, 15(3): 505-536

https://doi.org/10.1177/1354066109338243

Access to the published version may require subscription.

N.B. When citing this work, cite the original published paper.

Permanent link to this version:

http://urn.kb.se/resolve?urn=urn:nbn:se:uu:diva-87088

ERIK MELANDER is Associate Professor at the Department of Peace and Conflict Research, Uppsala University, and Senior Research Associate at the Joan B. Kroc Institute for International Peace Studies, Notre Dame University. He has previously published in journals such as *International Studies Quarterly, Journal of Peace Research, International Interactions, Journal of Cold War Studies,* and *Civil Wars*. He is the Deputy Director of the Uppsala Conflict Data Program and the coordinator of the Peace Process Implementation Effort (PRIME) project at the Kroc institute.

MAGNUS ÖBERG is Assistant Professor at the Department of Peace and Conflict Research, Uppsala University, and Research Associate at the Center for the Study of Civil War, International Peace Research Institute, Oslo. His most recent publication (co-edited with Kaare Strøm) is *Governance, Resources, and Civil Conflict* (Routledge, 2008). He is currently pursuing research projects on conflict prevention and on governance, globalization and civil war.

JONATHAN HALL is a Marie Curie Fellow at the Centre for Conflict Studies, Utrecht University, and a PhD Candidate at the Department of Peace and Conflict Research, Uppsala University. His most recent publication (co-edited with Ashok Swain and Joop de Haan) is *Islam and Violent Separatism: New Democracies in Southeast Asia* (London: Kegan Paul, 2007). He conducts research on various dimensions of the contemporary nature of war and peace, including global trends in the human impact of war, terrorism and the role of diasporas.

1

Are 'New Wars' More Atrocious?

Battle Severity, Civilians Killed and Forced Migration Before

and After the End of the Cold War

It is widely believed that the human impact of civil conflict in the present era is especially destructive.

Proponents of the 'new wars' thesis hold that today's conflicts are fuelled by exclusive identities, motivated

by greed in the absence of strong states, and unchecked by the disinterested great powers, resulting in

increased battle severity, civilian death and displacement. The ratio of civilian to military casualties is

claimed to have tilted, so that the overwhelming majority of those killed today are civilians. Using

systematic data that are comparable across cases and over time we find that, contrary to the 'new wars'

thesis, the human impact of civil conflict is considerably lower in the post-Cold War period. We argue this

pattern reflects the decline of ideological conflict, the restraining influence of globalization on

governments, and the increasing rarity of superpower campaigns of destabilization and counterinsurgency

through proxy warfare.

Word Count: 11 986

1. Introduction

As the Cold War came to an end a largely peaceful wave of democratization occurred, and a number of peace agreements were signed in longstanding civil wars previously fuelled by great power rivalry. But parallel to these positive developments there was, following the Cold War, an upsurge in new, and it seemed, especially violent civil conflicts in the Balkans, the Caucasus, and 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'. Case study research and theory building based upon observations drawn predominantly from the post-Cold War period provided the main thrust of their arguments. Comparing their findings with the conventional understanding of earlier wars, they claimed that changes in the nature of warfare have lead to an increase in its direct human impact.

Their arguments did not go unanswered. A debate soon followed in which critics pointed out that much of what 'new war' theorists identified as new in the nature of contemporary conflicts was in fact not new, calling into question the whole idea that the nature of war had changed. Some scholars argued on the basis of ethnographic research and historical narratives that certain empirical trends identified by 'new war' theorists did not stand up to empirical scrutiny, and others had at best sketchy underpinnings (Berdal, 2003; Kalvyas, 2001; Newman, 2004). Others maintained that the conceptualization lacked rigor in comparison to previous categorizations of war (Henderson and Singer, 2002). Though some proponents of the 'new wars' argued that the number of civil conflicts was gradually increasing, several empirical studies soundly refuted this claim (Gleditch et al., 2002; Mack, 2005; Marshall and Gurr, 2005). Others tested claims regarding the changing conduct of 'new wars' by investigating battle severity and civilians killed (Lacina, 2006; Lacina et al., 2006; Lacina and Gleditsch, 2005; Mack, 2005). In both cases their results pointed to downward trends since the end of the Cold war.

In this article we evaluate the key claim that the human impact of civil conflict has worsened since the end of the Cold War. To be clear, we do not aim to test every facet of the argument for the changing nature of warfare, but rather the central empirical evidence for its increasing human impact. We do this by

examining the veracity of several key empirical trends offered as evidence for the 'new wars' concept: (1) the severity of battle in civil conflicts is increasing; (2) the number of civilians killed in civil conflicts is increasing; (3) the number of civilians displaced in civil conflicts is increasing; and (4) the ratio of civilians to combatants killed in civil conflicts is increasing. Assertions regarding the human impact of 'new wars' are central to the current debate.² Indeed, among some academics, policy makers and in the mass media they are referred to like a mantra.³ However, the 'new wars' theorists and most of their critics alike have relied mainly on case studies and anecdotal evidence. Due to the scope and nature of these claims, single case studies and historical comparisons of a few select cases will never suffice to determine their veracity. To reliably establish whether there are any global and historical trends (up or down) we need two things: a) data that measure the same thing in the same way across cases and over time; and b) a research design that allows us to make inferences about general historical trends. We meet these criteria by putting four central claims for which we have data and which are still widely debated through systematic empirical tests.

What we find is that the human impact of civil conflict has diminished in the post-Cold War period. Battle severity, measured as battle deaths, has significantly declined. The magnitude of direct violence against civilians in civil conflict has also decreased. Civilian displacement follows a slightly more complicated pattern, similar to the trend in the number of civil conflicts; it is significantly higher in the period 1990-1994 than in either the Cold War period or in the period 1995-1999. While civil conflicts in the period 1990-1994 generate larger flows of displaced people than civil conflicts of the Cold War era, there is no consistent increasing trend in the data. On the contrary, the decrease in forced migration flow in the most recent time period is statistically significant.

The claim regarding the ratio of civilian to military casualties is not possible to evaluate directly since there is no systematic data on this aspect of armed conflict. However, we do offer an indirect test of this proposition: If the ratio of civilian to military victims has changed, when comparing conflicts with similar levels of battle severity from the Cold War and post-Cold War periods, we should expect to see higher numbers of civilian deaths in the latter. Moreover, if the ratio of civilian to military deaths is higher in the post-Cold War 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 et al., 2003; Melander, 2006; Melander and Öberg, 2006; Moore and

Shellman, 2002; Schmeidl, 1997). By holding battle severity constant and looking at the variation in civilian displacement and civilians killed, we test whether or not the ratio has changed significantly over time. What we find is that the ratio of civilian to military victims has decreased since the end of the Cold War.

Thus, our study makes two major contributions. First, we examine the *average trends* in the human impact of war, taking into account *all* civil conflicts and controlling for potentially confounding factors. Second, we show *a decline* in all four aspects of human impact. In other words, the dimensions of the human impact of civil conflicts for which we have systematic data all exhibit trends which are at odds with the basic claims of 'new war' theorists. Needless to say, this does not mean that civil conflict during the past decade and a half has not been greatly destructive to human life; it surely has been. But it has on average been less so than civil conflict during the Cold War period.

We offer an explanation for this pattern, arguing that the 'new wars' thesis exaggerates the human impact of civil war motivated by identity politics, that it misreads the effects of an increasingly globalized economy on the government side in civil conflict, and that it misjudges the consequences of reduced superpower interest in the developing world. We suggest that the pattern of lessening human impact of civil war following the ending of the Cold War reflects the decline of ideological conflict, the restraining influence of increasingly globalized economies on governments, and the lessening of superpower campaigns of destabilization and counterinsurgency through proxy warfare, sooner than any fundamental changes in the nature of warfare itself.

In the following section we briefly review the literature on 'new wars'. This is followed by a discussion of the empirical evidence presented in the debate between 'new wars' proponents and their critics. We then move on to specifying our research design and elaborate on the data used in the analysis. In the penultimate section we present our results. In the final section we sum up our findings and offer some alternative explanations for observed trends in the data to those offered by proponents of 'new wars'.

2. 'New Wars': Origins, Claims and Evidence

Scholars who argue for a distinction between 'old wars' and 'new wars' provide detailed and compelling descriptions of the changing nature of warfare. The reasons and evidence offered in support of this claim

therefore warrant serious consideration and empirical testing. One strand of the argument places the turning point between 'old' and 'new' wars around the end of the Second World War (Gray, 1997; Holsti, 1996; Van Creveld, 1991); another around the end of the Cold War (Duffield, 2001; Kaldor, 1999/2002; Kaldor and Vashee, 1998; Snow, 1996). The latter has proven most influential among academics, policy makers and in the popular media. We first review the origins of the debate and delineate the two strands of the argument. Thereafter we focus in more detail on the view that the end of the Cold War marks a fundamental shift in the nature of warfare. However, our arguments are not limited to addressing the post-Cold War strand of the 'new wars' argument. Both would be equally difficult to reconcile with the declining trend in the human impact of civil conflict following the end of the Cold War.⁴

The current controversy over the nature of war stems from opposing perspectives on the historical trajectory of social organization and its implications for the institution of the state. Some scholars claim, from an evolutionary or teleological point of view, that there is a pattern towards increasing levels of organization and complexity in human history, culminating perhaps one day in the establishment of a global state (Mueller, 2004; Wendt, 2003; Wright, 1942: 387, 396-405). Others argue that while the statessystem has come to dominate the globe since its beginnings in the early modern era, it is now in a process of decline (Holsti, 1996; Kaldor, 1999/2002; Van Creveld 1991, 1999). Conceptualizations of the current 'state of the state' among this latter group of scholars range from near collapse to severely endangered. Moreover, there is disagreement among them over when the turning point between state growth and state decline was reached. Some point to the end of the Second World War, others the end of the Cold War. This distinction delineates the two most important strands of the 'new wars' argument.

These opposing views, state growth versus state decline, predict different patterns of warfare. Mueller (1989, 2004), for example, sees the World Wars as marking the beginning of the end of the institution of war, starting with interstate wars and later extending to civil conflicts. On the other hand, proponents of the post-WWII 'new wars' see this moment as the beginning of war's transformation, from the stylized wars of the modern period to today's increasingly numerous, brutal and protracted internal conflicts. Van Creveld (1991: 60, 196, 207) identifies a 'spread' and 'rise' in 'low-intensity conflicts' or 'small wars' beginning with the decolonization period, which now marches forward as a result of the state's increasing loss of monopoly over armed violence. In Holsti's (1996: 16) view, 'The trend is clear: the threat of war between

countries is receding, while the incidence of violence within states is on an upward curve.' These 'new wars' are increasingly 'nasty, brutish and long' (Holsti, 1996: 40), with the consequence that 'such communities as refuse to look facts in the face and fight for their existence will, in all probability cease to exist (Van Creveld, 1991: 223).

Others mark the turning point for 'new wars' around the end of the Cold War (Duffield, 2001; Kaldor, 1999/2002; Kaldor and Vashee, 1998; Snow, 1996). The prominence of this strand of the argument is evidenced by the actual label given to the controversy. While several similar concepts were introduced – 'wars of a third kind', 'nontrinitarian wars', 'peoples' wars', and 'post-modern wars' – 'new wars', a concept coined by Mary Kaldor, gained preeminence (Holsti, 1996; Rice, 1988; Snow, 1997; Van Creveld, 1991). There is a great deal of overlap between the post-WWII and post-Cold War elements of the 'new wars' argument. Below we present an overview of the post-Cold War strand with a special emphasis on Kaldor (1999/2002), augmenting this with ideas important to both as we go along.

'New Wars' of the Post-Cold War Period

On a fundamental level, the social relations underpinning previous conceptualizations of war are thought to have changed (Kaldor, 1999/2002: 107). As a result, a shift in the nature of warfare has occurred, affecting the types of actors involved in wars, their goals, means of finance, and military conduct. In order to support this claim, three interrelated reasons are put forward: the increasing salience of identity in politics; the transformation of war economies; and the demise of the bi-polar world order of the Cold War.

The increasing salience of identity in politics is attributed to the collapse of modernity as a philosophical project and socio-political structure. Modernity refers to the ideas, actors and structures that give rise to increasingly complex and hierarchical systems of order. These systems include both nation-states and the wars waged among them (Kaldor, 1999/2002: 13-30). State-building in early modern Europe was intimately linked to the wars and war settlements of that period, which created fewer, more complex and more powerful states over time (Mueller, 2004; Tilly, 1978; Van Creveld, 1991). As portrayed in Clausewitz's *On War*, classical wars are confrontations among state armies and are a continuation of politics by other means, the logic of which tends towards extremes. This modern logic, which drives both state-building and classical modes of warfare, contains within it the seeds of its own destruction. The

totalizing wars of the early twentieth century were in many ways the culmination of the logic of 'old wars', yet in their genocidal tendencies they foreshadowed the coming brutality of 'new wars' (Shaw, 1999). The advent and spread of nuclear weapons came to limit war between major powers. However, by failing to achieve development and security within states, modern logic and organization contribute to the rise of exclusive identities. Unlike 'old wars', 'new wars' are thought to blur modern distinctions between internal and external, public and private, political and economic, civilian and military and even war and peace itself (Holsti, 1996: 36-40; Kaldor, 1999/2002: 5, 29). In so doing they represent a victory of exclusive forms of social organization (e.g. religion, language, and ethnicity) over 'inclusive' and modern ones (e.g. nationalism, democracy and socialism) (Kaldor, 1999/2002: 76-89; Snow, 1996: 103).

The transformation of war economies is attributed to the process of globalization and to decreasing support from the superpowers. According to Kaldor (1999/2002), globalization, or 'the intensification of global interconnectedness', decreases state sovereignty and capacity to the point of collapse, while at the same time it offers new opportunities to non-state actors driven by exclusive ideologies. After the end of the Cold War, support from the superpowers waned. As a result, the actors of the 'new wars' rely to a greater extent on financial opportunities afforded through globalization. A primary example is smuggling, which is facilitated by advancements in the speed and quality of telecommunications, banking and travel, and by the diaspora which provides a crucial link to the outside world (Duffield, 2002). Another equally malign effect of globalization is the weakening of the state. One important example of this is the effect of liberal structural adjustment programs on poor countries; through deregulation, privatization, and a reduction in state benefits, state capacity and oversight are reduced while incentives and opportunities to participate in the global illicit economy are increased. This and other aspects of globalization are thought to contribute to state failure. In the wake of state collapse, war becomes primarily a competition among various non-state actors over scarce resources, including the remnants of the state, the assets of the population and available inflows of materials, food and money. In such a situation, the state of war is preferable to peace because in war there are greater opportunities to extract rents, and cover is provided for illegal economic activity. In short, a sort of new economic logic is built into the functioning of the war economy such that war is no longer productive, as it was in old wars, but rather destructive and 'predatory' (Kaldor, 1999/2002: 90).

The end of the bi-polar world order is thought to have facilitated the rise of exclusive identities and the transformation of war economies, while at the same time it removed control over the behavior of actors in armed conflicts. With the end of the Cold War, the collapse of the Soviet Union discredited the ideology of socialism, and other areas of the world lost their privileged positions within the international system. Kaldor (1999/2002: 82) argues that 'As post-independence hopes faded, many politicians began to appeal to particularistic tendencies'. This also signaled a decline in arms transfers to Third World states which, by propping up incumbent governments, provided a 'deterrent capacity' against insurgents (Holsti, 1996: 132). As a result, it is thought that the proverbial 'lid' which contained ethnic conflict during the Cold War was removed. According to Snow, '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). 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). In sum, the increasing salience of identity, the transformation of war economies, and the end of the bi-polar world order of the Cold War are thought to combine to produce a fundamental shift in the nature and

world order of the Cold War are thought to combine to produce a fundamental shift in the nature and human impact of warfare. We now turn to the controversy over the empirical evidence for this assertion, which will provide the starting point for our analysis of the human impact of 'new wars'. We identify four empirical claims in the 'new wars' argument for which there exist systematic data: (1) the severity of battle in civil conflicts is increasing; (2) the number of civilians killed in civil conflicts is increasing; (3) the number of civilians displaced in civil conflicts is increasing; and (4) the ratio of civilians to combatants killed in civil conflicts is increasing. Although we do not hold that all proponents of 'new wars' subscribe to every one of these claims, each is held by at least some and several are held by the majority. In addition, some no longer held by many scholars remain influential in the media and public debate. By addressing them all, we offer the most compelling assessment possible of the 'new wars' argument regarding the changing human impact of war. Below we will briefly review evidence for each and indicate what we aim to test.

Evidence for 'New Wars'

The claim that battle severity is increasing (1) has received critique based upon quantitative as well as ethnographic and historical research. Kalyvas (2001: 116) in a review of recent ethnographical studies compares civil conflicts of the Cold War and post-Cold War periods and finds that '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.' As noted in the introduction, recent macro-level studies of battle deaths have noted a downward trend in the post-Cold War period. Contrary to the argument that Cold War patronage limited the outbreak and conduct of war, Lacina (2006: 286) asserts that the effect of foreign support on the conflict behavior of warring parties may be one of facilitation rather than restraint: 'What seems to be more important for determining the military severity of a civil war is the availability of foreign aid and intervention'. We provide an additional test for this claim, using the same data but a different research design.

Civilians killed (2) and displaced (3) are also thought to be increasing in the post-Cold War period. With greater battle severity, more civilians would be caught in the crossfire. In addition, the lack of restraint might mean that soldiers would be more likely to target civilians in pursuit of their political goals and economic needs. The strategy of 'winning hearts and minds' is thought to be intrinsic to inclusive ideologies, such as democracy and socialism. The increasing salience of exclusive identities leads to an altogether different strategy. 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, the territory is cleansed to secure victory in a future referendum (Kaldor, 1999/2002: 79, 98). However, others dispute the claim that this has lead to greater civilian death and displacement. Newman (2004: 10) points to postcolonial conflicts in Africa and Asia, internal wars in South America, upheavals in Russia and China, and civil war in Afghanistan, and wonders whether atrocities are greater in the post-Cold War period. In a recent study Harff (2003: 70) identifies the 'exclusionary ideology' of elites and elites representing an 'ethnic minority' as risk factors for genocide in civil war, yet this applies to both the Cold War and post-Cold War periods. Furthermore, while proponents of the 'new wars' argument assert that globalization unleashes 'new wars', Harff (2003: 70) finds international economic interdependence reduces the likelihood of large-scale violence against civilians. In

regards to the general trend, relying on data from Harff (2003), Mack (2005) argues that the total number of genocides and politicides have decreased since the end of the Cold War. In our analysis we focus specifically on countries experiencing civil conflict, thereby testing the claim that the number of civilians killed in civil conflicts is increasing.

It is difficult to generalize from one or a handful of cases to global trends. In support of the claim that displacement is increasing, Kaldor (1999/2002: 101) offers quantitative evidence in addition to her case study of Bosnia-Herzegovina. According to UNHCR (2000), the total number of refugees has increased dramatically over the past quarter century, from 2.4 million in 1975 to 14.4 million in 1995. Alternatively, USCR (2000) claims that the number of refugees has increased from 22 million in 1980 to 38 million in 1995, half of which were internally displaced. On the basis of these figures both scholars and the mass media alike have claimed that forced migration is on an upward trend. There is a crucial problem in the use of these data to support the argument that civilian displacement is increasing in the post-Cold War period. Displaced people often cannot return home for many years; if fewer people return than flee, even if 'new wars' generate significantly fewer new forced migrants than 'old wars', the total stock of displaced persons may continue to rise. In regards to the total number of people living in displacement during the years immediately following the end of the Cold War, a large portion had fled while the Cold War was still ongoing. We therefore argue that the relevant comparison is between the numbers of new displaced persons that different conflicts generate, and investigate this in our analysis of civilian displacement.

Perhaps the most oft-cited evidence for the changing nature of warfare is the ratio of civilian to military casualties (4). For example, Kaldor (1999/2002: 100) states 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.' Figures similar to these have been repeated by researchers and circulated in the media for many years. However Lacina and Gleditsch (2005: 146) argue these ratios of civilian to military death result from a misinterpretation of official military statistics and the application of ill-suited categorizations to research on civil conflicts. A recent report by Sollenberg (2006) argues that the available data collected by historians on the ratio of civilian to military deaths does

not support any trends over time. Moreover, key cases referred to in support of this claim do not hold up to scrutiny. For example, for World War I, World War II, and the war in Bosnia and Herzegovina 1992-1995, estimates of civilian and military deaths provided by historians and demographers are very similar. They are all fairly typical with ratios close to 50/50. As mentioned in the introduction, we provide a unique test of this proposition by controlling for battle severity and observing the variation in civilians killed and forced migration over time.

3. Data and Research Design

Unlike most previous research we evaluate the human impact of 'new wars' using a large-N research design. A large-N design does not allow us to scrutinize each case in great detail, nor does it allow us to look at all aspects of what some theorists claim is new about 'new wars.' But this was never our purpose. We merely wish to establish whether or not the human impact of civil war is increasing as proponents of the 'new wars' thesis claim. For this purpose a large-N design gives us a distinct advantage. To determine what is the typical human impact of internal armed conflict at any given time requires that we look at all conflicts at that time (or a sample that allows us to make inferences to the whole population of conflicts at that time) – not just the ones that support our view. To determine if there is a trend over time we need to know what is typical at many points in time. Thus, to ascertain the trend in the human impact of civil war, we need to look at a large number of cases over a considerable number of years. Thus, we examine battle severity, civilian casualties, and civilian displacement by looking at the universe of internal armed conflicts over time. These three dimensions of human impact serve as dependent variables in three separate multiple regressions that include temporal dummy variables as well as numerous control variables.

The quality of the data that goes into the analysis is obviously important for how much confidence one should put in our findings. Battle deaths, civilian deaths, and civilian displacement are all difficult to measure with great precision. Thus, the figures given by the data are best thought of as estimates, and, as is the case with all types of estimates, they contain a margin of error; this will not affect our conclusions as long as the errors are not systematic. However, there is reason to believe that there is a systematic error in the estimates of battle deaths, civilian deaths, and civilian displacement over time. The reporting on which the data are based became significantly better in the mid- to late-1980s. Thus it is likely that the data we use

systematically *underestimates* battle deaths, civilian deaths, and civilian displacement before the mid1980s, and that the problem increases as we go further back in time. This means that the data are rigged in
favor of the 'new wars' claims. Therefore, if we find in favor of the 'new wars' claims this data problem
will cast some doubt on the results. However, if we find against the 'new wars' claims this data problem
should serve to strengthen our confidence in the findings.

We take into account all intrastate armed conflicts (including internationalized intrastate armed conflicts) identified in the UCDP/PRIO Armed Conflict dataset (Gleditsch et al., 2002; Harbom and Wallensteen, 2005a). The two most critical indicators of human impact – civilians killed and forced migration flows – are available aggregated for each country in a given year. This means that although several different conflicts may be fought simultaneously in one country in any given year, separate information on civilians killed and forced migration flows for each individual conflict is unavailable. 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 763 observations from the intrastate armed conflicts of the Cold War era (1946-1989) and 438 observations from those of the post-Cold War era (1990-2002).

Our first dependent variable is battle severity. To measure battle severity 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 (2005: 148) and include 'all people, soldiers and civilians, killed in combat'. Since civilians killed in military operations are counted, the battle death measure will indirectly capture part of the atrocities of civil conflict. The other two dimensions that we examine – namely civilians killed and forced migration flows – more directly and fully capture the human impact of civil conflict. Since battle deaths is an excellent measure of the severity of combat, we will also enter this as a control variable when examining civilians killed and forced migration flows. In this way we will ensure that any temporal effects (Cold War era versus post-Cold War era) on the other dimensions are not conflated with variations in the severity 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 an indicator called genocide/politicide, defined and coded by the State Failure project¹⁰. The genocide/politicide indicator is conceived of very broadly 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 et al., 2001: 15). In civil conflicts, violence by either the government side or the rebel side is included.¹¹ Only unarmed civilian victims are counted, not combatants. The temporal domain of this variable is 1956-2004.

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 from, and internally displaced people in, a country in a given year. This is the most commonly used measure in research on forced migration, and is obtained by summing the number of refugees and internally displaced persons for each country each year, subtracting the sum for the previous year, and truncating the negative values at zero. We have data series with good coverage for both refugees and internally displaced people for the years 1980-1999.

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 post-Cold War era 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.

Statistical Controls

Since our purpose is to examine the human impact 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. It is, however, relevant to control for possible confounding factors. Factors that differ systematically between the Cold War era and the post-Cold War era, and which are also correlated with the dependent variable may distort our findings unless they are included in the regressions. For example, the level of democracy is associated in previous research with all three dependent variables and the end of the Cold War is associated with a wave of democratization. Thus, democracy level is a factor that is *both* correlated with the dependent variables and varies systematically between the Cold

War and post-Cold War eras. Democracy reduces forced migration in internal armed conflicts and so if we do not include democracy in the regressions we may erroneously attribute smaller refugee flows in the post-Cold War era to new forms of warfare. Below we identify and justify a number of potentially confounding factors that we include as control variables in the regressions.

We propose four main control variables that may have this effect: 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, civilians killed 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 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 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 (Cf. 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 civilians killed 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 large-scale violence against civilians and produce more severe violent struggles in society (Cf. Hibbs, 1973). By controlling for a curvilinear effect of the level of economic development, we aim to take this possibility into account.

The third aspect that we will control for in relation to all three dependent variables is the level of democracy. Previous research has found that democracy is associated with less lethal intrastate armed conflicts (Lacina, 2006), less genocide/politicide (Harff, 2003a) and less forced migration (Davenport;

Moore and Poe, 2003; Melander and Öberg, 2006, 2007; Moore and Shellman, 2004; Schmeidl, 1997). When examining battle deaths and civilians killed we will also add a squared term of the democracy measure in order to capture possible curvilinear effects. This is because some studies have suggested that genocide/politicide and civil war is more likely in semi-democracies located roughly in the middle of the democracy scale (Cf. Fein, 1995; Hegre et al., 2001). In line with most studies in the field, the measure of democracy we employ is Polity2. This index was created by the Polity Project, Phase IV (Marshall and 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 (1999). This variable measures the level of institutional democracy, and ranges from –10 (least democratic) to 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.

Finally, for all three dependent variables we also control for the severity of involvement in armed conflict with other countries. It is reasonable that the human impact of intrastate armed conflict may become more extensive 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. The data on battle deaths comes from Lacina and Gleditsch (2005). Interstate armed conflicts are becoming increasingly rare, making the severity 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 severity 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 severity of battle. Conflict duration and its square term are also included when we turn to civilians killed.

A second control variable that we use for both battle severity and civilians killed 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 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 civilians killed, we also include a measure of trade openness that previous research has found to be associated with lower risks of large-scale violence against civilians. 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 large-scale violence against civilians less likely. Trade openness has generally increased over time in most countries; hence, we include it as a control.¹⁵

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 centers 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 severity of fighting becomes insignificant for explaining forced migration flows (Melander and Öberg, 2004, 2006).

Temporal Dependence

Many intrastate armed conflicts are active for two or more consecutive years. We want to take into account the possibility that the human impact in the present year may be related to that of 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

reflecting the duration of intrastate armed conflict captures additional temporal elements that may differ systematically between the Cold War and post-Cold War eras.

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 and Öberg, 2006). When examining forced migration we will include these controls. For further details we refer the reader to our previous article.

Estimation Techniques

We use different multiple regression techniques depending upon the character of the 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 amenable 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 (with or without 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 stay or flee is not independent of the decisions of other people 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.

4. Analysis and Findings

In this section we present the trends in the data that we use to examine the human impact of 'new wars', and employ multiple regression techniques to test if the advent of the post-Cold War era has made civil

18

conflicts significantly more destructive in this manner. 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 (two-tailed test).

The Severity of Battle

Figure 1 below illustrates the trend in average battle deaths per country for countries that are involved in at

least one intrastate armed conflict.¹⁶

ABOUT HERE: Figure 1: Average Battle Deaths, 1946-2002

Figure 1 immediately reveals that the numbers of battle deaths in countries ravaged by civil conflicts if

anything was higher during the Cold War era than during the post-Cold War era. The following cases may

be used to exemplify the severity of fighting occurring in the civil conflicts of the Cold War period: the

Chinese civil war 1946-1949, the Tibetan uprising 1959, the Lebanese civil war 1976-1990, and the

internationalized civil war in Afghanistan 1979-. ¹⁷ The post-Cold War era saw several severe civil wars as

well, such as the Islamist uprising in Algeria 1991-, the war in Bosnia-Herzegovina 1992-1995, and the

Second Congo War 1998-2003. These and other horrible cases notwithstanding, Figure 1 clearly shows

how the 'new wars' of the post-Cold War period were on average less severe than the civil conflicts of the

darkest years of the Cold War.

Despite this telling graph we will move on to a multiple regressions analysis in order to examine if the

'new wars' of the post-Cold War era are significantly bloodier when the set of control variables is taken

into account. In Table 1 below we present our findings regarding the severity of battle measured as battle

related fatalities.

TABLE 1

The results presented in Table 1 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 severity, 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 severe 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 severe than civil conflicts in the Cold War era. Lacina (2006) reports similar results, and we thus confirm the robustness of her finding using the same data while employing an alternative research design.

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.¹⁸

Number of Civilians Killed

Figure 2 shows the trend in the average level of violence targeting civilians per country for those countries that had at least one active intrastate armed conflict for the years 1956-2004.

Again it is immediately apparent from the graph that the civil conflicts during the Cold War era on average were more destructive in terms of violence against civilians than the 'new wars' of the post-Cold War era. Although only one instance of mass killings of civilians is recorded in the data during the 1950s (Tibet in 1959), a majority of the worst massacres in modern history occurred during the civil wars of the Cold War, e.g., in Indonesia in 1965, in Nigeria (Biafra) 1967-1970, in East Pakistan (Bangladesh) in 1971, in Cambodia 1975-1979, and in Sudan culminating in 1988. The post-Cold War period is also marred by truly destructive civil conflicts, e.g. the Rwandan genocide in 1994 and the war in Bosnia-Herzegovina 1992-1995. Several civil conflicts that had already reached their climax in terms of civilian killings during the Cold War years continued to devour civilian lives at a horrific rate, e.g. in Sudan (South Sudan and most recently Darfur), in Iraq until 1991 and in Angola until 2002. In spite of the shocking images of civilian slaughter that we have seen from these and other recent conflicts, the overall pattern that can be gleaned from Figure 2 is that the civil conflicts of the Cold War era were even worse.

In Table 2 below we present our multiple regression results regarding the magnitude of violence directly targeting civilians.

TABLE 2

In parallel to the results regarding battle severity, we find that the number of civilians killed in civil conflict in the post-Cold War era is significantly lower than in the Cold War era. Thus, the empirical evidence is again contrary to what 'new wars' theorists have argued.

The only control variables that are retained in the trimmed model are Regime Type with its squared term and the dummy indicating regime transition or collapse. The Regime Type variable captures a curvilinear relationship between the level of democracy and the propensity of countries involved in civil conflict to experience large-scale violence against civilians. 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. Countries undergoing transitions or regime collapse are also less prone to experience large-scale violence against civilians.

Number of Civilians Displaced

Figure 3 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 3 suggests that civilian displacement in civil conflict peaked around the end of the Cold War, a pattern that is in line 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 human impact 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 post-Cold War era. Examples of countries in civil conflict that produced enormous flows of displaced people in 1990 are Mozambique, Sudan and Liberia. The flows in Mozambique and Sudan peaked in 1990, but both of these countries experienced vast forced displacement before as well as after this year, as the wars in these countries had been fought with utmost brutality during the Cold War and raged on for years after the end of the Cold War (the conflict in Mozambique ended in 1992; the conflict in South Sudan ended in 2004 at which time the Darfur conflict had erupted). During the 1980s, forced displacement also uprooted millions of people in, e.g., Angola, Afghanistan, Ethiopia and Iran. The first half of the 1990s (i.e., 1990-1994) also witnessed millions of people fleeing from civil conflicts in, e.g., Rwanda, Turkey, and Somalia. The largest flows in the second half of the decade (i.e., 1995-1999) occurred in Afghanistan, Democratic Republic of Congo and Angola.

The pattern displayed in Figure 3 is less clear-cut than the previous graphs. Given the established peak in intrastate armed conflicts around the end of the cold war a disaggregated analysis of the influence of time is warranted. 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.

Table 3 shows the multiple regression result when forced displacement of civilians is the dependent variable 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 3. 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 count equation (upper

part of Table 3) 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 3

Table 3 shows that there is indeed a statistically significant peak in forced migration in the 1990-1994 period, which 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 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. These findings thus also contradict the 'new wars' argument that there is an increasing trend in forced displacement of civilians from the Cold War to the post-Cold War period.

The significant control variables in the trimmed model show that the severity 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.

Ratio of Civilian to Military Deaths

As noted in the introduction, we lack systematic data on the ratio of civilian to military deaths and therefore we cannot test this 'new war' claim directly. However, we do have systematic data on battle deaths, on civilians killed, and on civilian displacement. The data on battle deaths includes both combatants and civilians killed in battle, but it does not include deaths from violence directly targeting civilians (e.g. massacres, murderous ethnic cleansing, or genocidal violence). If the ratio of civilian to military victims has 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 Table 2 we see that when we hold battle severity constant, the trend in civilians killed is decreasing. This suggests that, if anything, the ratio of civilian to military casualties is lower in the post-Cold War period than in the Cold War period. Second, as noted earlier, if the ratio of civilian to combatant deaths is higher in the post-Cold War 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 et al., 2003; Melander and Öberg, 2007, 2006; Moore and Shellman, 2004; Schmeidl, 1997). The results in Table 3 show that, controlling for battle severity the flows of forced migrants in civil conflicts peaked in 1990-1994, and then substantially and significantly declined. Thus, we conclude that there is no support for the claim that the ratio of civilian to military casualties has increased significantly in the post-Cold War period. It should be noted that the evidence underlying this conclusion is only indirect, but it seems that the ratio of civilian to military casualties has, if anything, decreased since the end of the Cold War.

5. Discussion

We have shown that, contrary to the 'new wars' thesis, battle severity and civilians killed in civil conflicts have significantly decreased since the end of the Cold War. Forced migration in civil conflicts peaked in the 1990-1994 period, but subsequently decreased in the 1995-1999 period, down to about the same level as in the 1980s. Thus our result concerning forced migration also contradicts the 'new wars' thesis. Furthermore, our evidence suggests that the ratio of civilian to military casualties is declining. These empirical patterns cannot easily be reconciled with the theoretical arguments that predict a worsening human impact of civil war in the post-Cold War era due to increased salience of identity politics, the transformation of war economies, and the end of the global ideological rivalry between the superpowers.

In fact, previous empirical studies suggest that identity-based civil conflict has no worse human impact than conflict driven by the modern ideologies that dominated much of the Cold War. It is an established result in the research on forced migration that ethnic conflicts are no more prone to cause forced migration than are revolutionary conflicts (Melander and Öberg, 2006; Moore and Shellman, 2004; Schmeidl, 1997). The logic of this argument is also questionable. Granted, identity-based conflicts may well entail fewer attempts by the opposing sides to win over supporters from the adversary camp than classical ideological

struggles. Instead of aiming to win the 'hearts and minds' of the population, ethnic actors may opt for ethnic cleansing and massacres. But at the same time there is also an inherent limit to most ethnic conflicts precisely because they involve relatively clearly delimited parts of the population of multi-ethnic states (Fearon, 1998). Ideological conflicts, in contrast, typically have the potential to engulf everyone, and when ideologically motivated actors doubt their ability to win the loyalty of the population through persuasion they often resort to massive terror instead, as the killings fields of the Khmer Rouge in Cambodia testify (Valentino, 2004). Thus, whereas Kaldor holds that the discrediting of socialist ideologies contributed to the growth of particularly deadly, exclusivist identity politics, we note that the demise of Communism rid most of the world of an ideology in the name of which unprecedented numbers of people were murdered, both in times of war and peace (Rummel 1994).

The 'new wars' theorists are probably right that rebel groups in the post-Cold War period increasingly have to rely on local resources like civilian loot and raw materials, and that globalization has facilitated rebels' access to illicit markets and diaspora resources. Possibly this changed rebel economy entails increased incentives to victimize civilians. However, the worst perpetrators of massacres and forced expulsion of civilians are governments. We believe that the 'new wars' theorists have underestimated the restraining effect that globalization has on most governments. As economies are increasingly integrated into global markets, governments in civil conflict become more vulnerable to market repercussions in the form of investors reallocating their capital away from risk. Also, in the globalized world of today economic development is increasingly dependent on intellectual capital that must be enticed rather than coerced (Cf. Gartzke, 2007). This means that the incentives for governments to limit conflicts should be more powerful in the post-Cold War period. A case in point is the restrained response of the Mexican government to the Zapatista uprising in 1994 for fear of driving off investors (Mason, 2003: 23).

The 'new wars' thesis also gets the impact of the ending of the Cold War wrong, underestimating the extent to which superpower rivalry fuels extremely destructive campaigns of destabilization and counterinsurgency through proxy warfare. Instead of restraining and stabilizing their weak client states in the Third World out of fear of escalation (keeping the 'lid' on ethnic conflicts), the more important tendency of the super powers during the Cold War was to flood much of the developing world with arms and aid intended for war. In order to destabilize the clients of their rival and to help their own allies

maintain control, the super powers goaded their pawns into unrestrained war. Clear examples would be the American support for South Africa and its destabilization campaign against Angola, Mozambique and other neighboring countries, and the Soviet support for the socialist Mengistu regime of Ethiopia that used mass-starvation as a weapon. When the superpower rivalry ended, the main effect was not that previously restrained dogs of war were unleashed, but rather the opposite: some of the worst killer bands, in governments or fighting units, have since the end of the Cold War been reined in or dissolved.

In conclusion, 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 out the baby with the bath water. The 'new wars' literature has provided valuable insights into the nature of civil conflicts in general, e.g. concerning rebel organization, the war economy, the high incidence of criminality, and the widespread use of child soldiers. It has also helped dispel some earlier myths about rebel behavior and motivations. However, the nature of civil conflict has changed less than many argued, and the effects of some of the changes have been different than expected. What changed the most in the decade following the end of the Cold War was probably the way we look at civil conflict. We would do well to remember the terrible atrocities occurring during the Cold War, fuelled by ideological conflict and superpower rivalry via proxy wars, destabilization campaigns and the greatest military build-up in history.

-

¹ The peak in civil conflicts between 1989 and 1992 reflects 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 and a general decline in the number of new conflicts (Eck et al., 2007). Although the number of internal wars now constitutes a greater proportion of all wars, this is due to a decrease in the number of international wars (Mueller, 1989). During the period 1990-2004, only four of 57 active conflicts were interstate wars (Harbom and Wallensteen, 2005b: 83).

² Kaldor (2005: 214), for example, recently argues 'What has increased is the ratio of civilian to military

casualties and the numbers of displaced persons per conflict.'

³ See discussions in Lacina & Gleditsch (2005: 146); Mack (2005: 64, 75); and Newman (2004: 177-179).

⁴ It is worth noting that some proponents of the 'new wars' concept do not separate interstate from intrastate wars, but rather discuss the nature of warfare in more general terms. However, their theoretical arguments (regarding, for example, the effects of globalization on state strength) concern conditions (global or local) resulting in the increasing human impact of armed conflict within states. We thus focus on internal armed conflicts and do not address the human impact of interstate wars.

⁵ See also First Supplement: Concerning the Guarantee of Perpetual Peace in Kant (1795/2005).

⁶ New and Old Wars: Organized Violence in A Global Era, published first in 1999 by Stanford University Press, reprinted three times, and again as a second edition in 2006, is Kaldor's definitive treatise on the subject.

⁷ See also Kaldor (1999/2002: 100) and Snow (1996: 111).

⁸ Kaldor misquotes the figure for 1975 (mistakenly using the figure for 1974), which is actually 2.99 million (UNHCR, 2000). Kaldor also quotes a figure for internally displaced people, 5.4 million, for which she combines two UNHCR categories ('Internally Displaced' and 'Returned IDPs'). 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 would actually be 4 million (UNHCR, 2000: 309).

- ⁹ Due to missing data on the different dependent variables, the number of observations used in the analyses is lower.
- ¹⁰ http://globalpolicy.gmu.edu/pitf/. Last accessed 7 September 2007.
- Most large-scale violence against civilians seems to be perpetrated by governments. A prominent example in the data of mass killings of civilians perpetrated mainly by the rebel side is the war in Bosnia-Herzegovina 1992-1995.
- ¹² This list of states is compiled so as to be particularly suitable for time series analysis.
- ¹³ 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.cidem.umd.edu/inscr/polity/index.htm. Last accessed 7 September 2007.
- ¹⁴ 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 external conflicts.
- ¹⁵ Trade openness has also been found to be negatively related to the risk of civil war (de Soysa, 2002).
- ¹⁶ 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.
- ¹⁷ We adhere to the classification in the dataset compiled by Lacina and Gleditsch (2005) and consequently consider the Korean (1950-1953) and Vietnam (1965-1975) 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.
- ¹⁸ 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 these two control variables does not affect the conclusion that 'new wars' of the post-Cold War period are less severe in terms of battle deaths than the civil conflicts that wrought havoc during the Cold War.

References

- Beck, Nathaniel and Jonathan N. Katz (1995) 'What to Do (and Not to Do) with Time-Series Cross-Section Data', *American Political Science Review* 89 (3): 634-647.
- Berdal, Mats (2003) 'How "New" are "New Wars"? Global Economic Change and the Study of Civil War', *Global Governance* 9: 477-502.
- Collier, Paul and Anke Hoeffler (2001) 'Greed and Grievance in Civil War',

 (http://www.worldbank.org/research/conflict/papers/greedandgrievance.htm). Last accessed 7

 September 2007.
- Davenport, Christian A., Will H. Moore and Steven C. Poe (2003) 'Sometimes You Just Have to Leave:

 Domestic Threats and Forced Migration, 1964-1989', *International Interactions* 29 (1): 27-55.
- de Soysa, Indra (2002) 'Paradise Is a Bazaar? Greed, Creed, and Governance in Civil War, 1989-99', Journal of Peace Research 39 (4): 395-416.
- Duffield, Mark (2001) Global Governance and the New Wars: The Merging of Development and Security.

 London: Zed.
- Duffield, Mark (2002) 'Social Reconstruction and the Radicalization of development: Aid as a Relation of Global Liberal Governance', *Development and Change* 33 (5): 1049-1071.
- Eck, Kristine, Bethany Lacina and Magnus Öberg (2008) 'Civil Conflict in the Contemporary World', in Magnus Öberg and Kaare Strom (eds) *Resources, Governace, and Civil Conflict.* London: Routledge.
- Fearon, James D. (2003) 'Commitment Problems and the Spread of Ethnic Conflict', in David A. Lake and Donald S. Rothchild (eds) *The International Spread of Ethnic Conflict: Fear, Diffusion, and Escalation*, pp. 107-126. Princeton: Princeton University Press.
- Fearon, James D. and David D. Laitin (2003) 'Ethnicity, Insurgency, and Civil War', *American Political Science Review* 97 (1): 75-90.
- Fein, Helen (1995) 'More Murder in the Middle: Life-Integrity Violations and Democracy in the World', Human Rights Quarterly 17 (1): 170-191.
- Gartzke, Erik (2007) 'The Capitalist Peace', American Journal of Political Science 51(1): 166-191.

- Gleditsch, Kristian S. (2004) 'Modified Polity P4 and P4D Data, Version 1.0'

 (http://privatewww.essex.ac.uk/~ksg/polity.html). Last accessed 7 September 2007.
- Gleditsch, Kristian S. and Michael D. Ward (1999) 'Interstate System Membership: A Revised List of the Independent States since 1816', *International Interactions* 25: 393-413.
- Gleditsch, Nils P., Peter Wallensteen, Mikael Eriksson, Margareta Sollenberg and Håvard Strand (2002)

 'Armed Conflict 1946-2001: A New Dataset', *Journal of Peace Research* 39 (5): 615-637.
- Gray, Chris H. (1997) Postmodern War: The New Politics of Conflict. New York: Guilford Press.
- Harbom, Lotta and Peter Wallensteen (2005a) 'Armed Conflict and Its international Dimensions, 1946-2004', *Journal of Peace Research* 42 (5): 623-635.
- Harbom, Lotta and Peter Wallensteen (2005b) *States in Armed Conflict 2004*. Uppsala: Department of Peace and Conflict Research, Uppsala University.
- Harff, Barbara (2003) 'No Lessons Learned from the Holocaust? Assessing Risks of Genocide and Political Mass Murder since 1955', *American Political Science Review* 97 (1): 57-73.
- Hegre, Håvard, Tanja Ellingsen, Scott Gates and Nils Petter Gleditsch (2001) 'Toward a Democratic Civil Peace? Democracy, Political Change, and Civil War, 1816-1992', *American Political Science Review* 95 (1): 33-48.
- Henderson, Errol A. and David J. Singer (2002) "New Wars' and Rumors of 'New Wars", *International Interactions* 28 (2).
- Holsti, Kalevi J. (1996) The State, War and the State of War. Cambridge: Cambridge University Press.
- Kaldor, Mary (1999/2002) New and Old Wars: Organized Violence in a Global Era. Cambridge: Polity.
- Kaldor, Mary (2005) 'Elaborating the 'New War'Thesis', in Isabelle Duyvesteyn and Jan Angstrom (eds)

 *Rethinking the Nature of War. London: Frank Cass.
- Kaldor, Mary and Basker Vashee, eds (1998) New Wars. London: Printer.
- Kalyvas, Stathis N. (2001) "New' and 'Old' Civil Wars A Valid Distinction?' *World Politics* 54 (1): 99-108.
- Kant, Immanuel (1795/2005) Perpetual Peace. New York: Cosimo.
- King, Gary (1989) 'Event Count Models for International Relations: Generalizations and Applications', International Studies Quarterly 33 (2): 123-147.

- Lacina, Bethany (2006) 'Explaining the severity of civil wars', *Journal Of Conflict Resolution* 50 (2): 276-289.
- Lacina, Bethany, Nils Petter Gledistch and Bruce Russett (2006) 'The Declining Risk of Death in Battle', International Studies Quarterly 50 (1).
- Lacina, Bethany and Nils Petter Gleditsch (2005) 'Monitoring trends in global combat: A new dataset of battle deaths', *European Journal Of Population-Revue Europeenne De Demographie* 21 (2-3): 145-166.
- Long, Scott J. (1997) Regression Models for Categorical and Limited Dependent Variables. Thousand Oaks: Sage.
- Mack, Andrew (2005) The Human Security report. Oxford: Oxford University Press.
- Marshall, Monty G. and Ted R Gurr (2005) Peace and Conflict 2003: A Global Survey of Armed Conflicts, Self-Determination Movements, and Democracy. College Park, MD: CICDM, University of Maryland at College Park.
- Marshall, Monty G., Ted Robert Gurr and Barbara Harff (2006) 'Political Instability (State Failure)

 Problem Set: Internal Wars and Failures of Governance, 1955-2004', Political Instability Task Force

 (http://globalpolicy.gmu.edu/pitf/PITF%20Problem%20Set%20Codebook%20v2001.doc). Last
 accessed 7 September 2007.
- Marshall, Monty G. and Keith Jaggers (2000) Polity IV Project: Data User's Manual. P4v2000. College Park. INSCR/CICDM.
- Mason, T. David (2003) 'Globalization, Democratization, and the Prospects for Civil War in the New Millennium', *International Studies Review* 5(4): 19-35.
- Melander, Erik (2006) Forced Expulsion of Civilians in Bosnia-Herzegovina and Kosovo. Report to the Swedish Emergency Management Agency. Uppsala: Department of Peace and Conflict Research, Uppsala University.
- Melander, Erik and Magnus Öberg (2007) 'The Threat of Violence and Forced Migration: Geographical Scope Trumps Intensity of Fighting', *Civil Wars* 9(2): 156-173.
- Melander, Erik and Magnus Öberg (2006) 'Time to Go: Duration Dependence in Forced Migration', International Interactions 32 (2): 129-152.

- Moore, Will H. and Stephen M. Shellman (2002) Fear of Persecution: A Global Study of Forced Migration, 1952-1995, Mimeo, Florida State University.
- Moore, Will H. and Stephen M. Shellman (2004) 'Fear of Persecution: A Global Study of Forced Migration, 1952-1995', *Journal of Conflict Resolution* 40 (5): 723-745.
- Mueller, John (1989) Retreat from Doomsday: The Obsolescence of Major War. New York: Basic Books.
- Mueller, John (2004) The Remnants of War. Ithaca, NY: Cornell University Press.
- Newman, Edward (2004) 'The 'New Wars' Debate: A Historical Perspective is Needed', *Security Dialogue* 35 (2): 173-189.
- Rice, Edward (1988) Wars of the Third Kind: Conflict in Underdeveloped Countries. Berkeley: University of California Press.
- Rummel, Rudolph J. (1994). *Death by Government: Genocide and Mass Murder Since 1900*. New Brunswick, NJ: Transaction.
- Russett, Bruce and John Oneal (2001) *Triangulating Peace: Democracy, Interdependence, and International Organizations*. New York: Norton.
- Schmeidl, Susanne (1997) 'Exploring the causes of forced migration: A pooled time-series analysis, 1971-1990', *Social Science Quarterly* 78 (2): 284-308.
- Shaw, Martin (1999) 'War and Globality: The Role and Character of War in the Global transition', in Ho-Won Jeong (ed) *The New Agenda for Peace Research*, pp. 61-80. Aldershot: Ashgate.
- Snow, Donald M. (1996) *Uncivil wars: international security and the new internal conflicts*. Boulder: Lynne Rienner Publishers.
- Sollenberg, Margareta (2006) Civilian Consequences of War: A Review of the Literature. Report to the Swedish Emergency Management Agency. Uppsala: Department of Peace and Conflict Research, Uppsala University.
- Tilly, Charles (1978) 'War Making and State making as organized Crime', in Peter B. Evans, Dietrich Rueschemeyer, and Theda Skocpol (eds) *Bringing the State Back In*, 169-91. Cambridge: Cambridge University Press.
- UNHCR (2000) The State of the World's Refugees: Fifty Years of Humanitarian Action. Oxford: Oxford University Press.

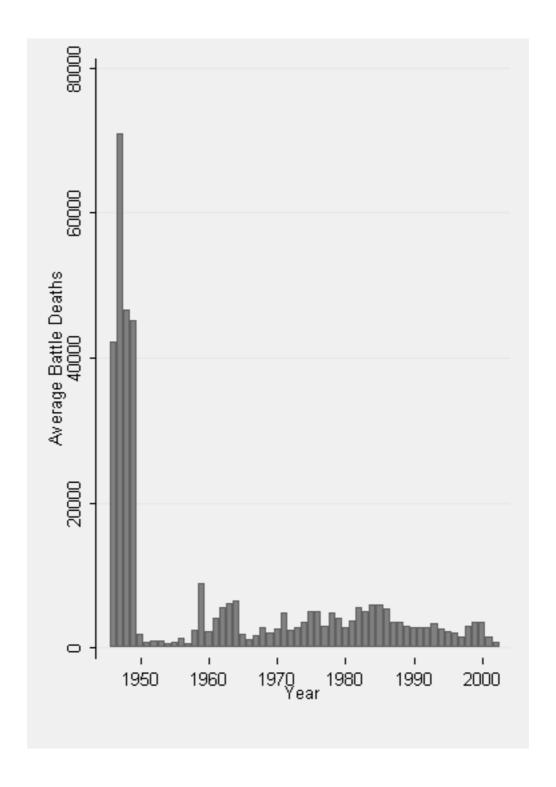
USCR (2000) World Refugees Survey 2000. Washington D.C.:Immigration and Refugee Services of America.

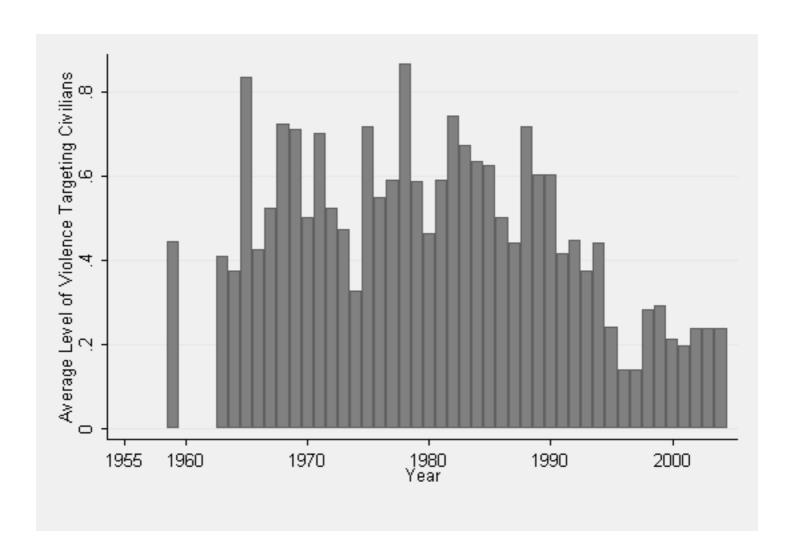
Van Creveld, Martin (1991) The Transformation of War. New York: The Free Press.

Van Creveld, Martin (1999) The Rise and Decline of the State. Cambridge: Cambridge University Press.

Wendt, Alexander (2003) 'Why A World State is Inevitable', *European Journal of International Relations* 9.

Wright, Quincy (1942) A Study of War. Chicago: University of Chicago Press.





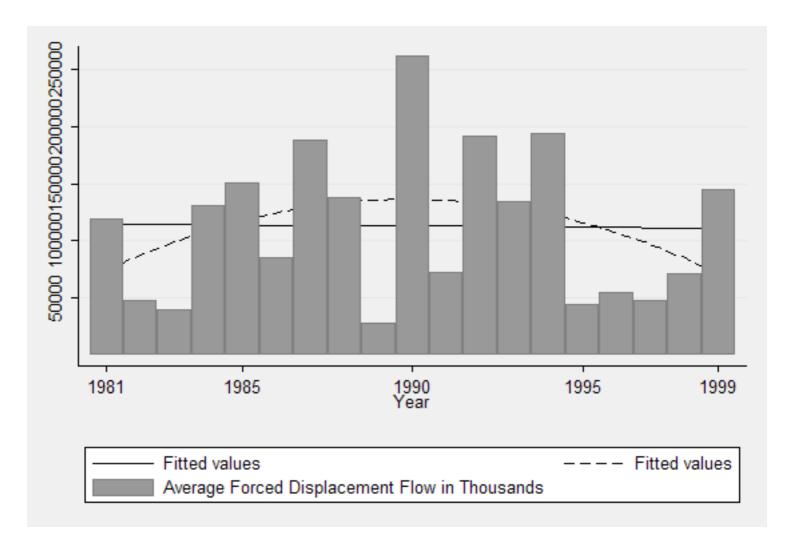


Table 1. Battle Severity

Battle Severity	(1) Complete Model	(2) Trimmed Model	
Civil conflict battle severity _{t-1}	.77 (.05) ***	.77 (.19) ***	
New war	-707.71 (320.20)*	-947.88 (396.84) *	
Civil conflict duration	-79.55 (39.66)*		
Civil conflict duration ²	1.38 (.83)(*)		
Log of population _{t-1}	280.03 (152.04)(*)		
Log of GDP/Capita _{t-1}	-2531.36(1436.47)(*)		
Log of GDP/Capita ² _{t-1}	177.83(99.75)(*)		
Regime type _{t-1}	-3.69 (5.80) [†]		
Regime type ² _{t-1}	-71.19 (28.45) *		
Regime transition or collapse _{t-1}	1068.65(1017.72)		
Regime age _{t-1}	-8.57 (5.50)		
Interstate conflict battle severity _{t-1}	0095(.0085)		
Constant	8031.25 (4769.42) (*)	1383.33 (670.23)*	
n	1086	1189	

n 1086 1189 Notes: OLS regression. Panel corrected standard errors in parenthesis. *** p<.005, ** p<.01, * p<.05, (*) p<.10 (two tailed test). † Jointly significant with squared term.

Table 2. Civilians Killed

Civilian casualties	(3) Complete Model	(4) Trimmed Model
Civilian casualties _{t-1}	1.96(.19)**	1.98 (.18)***
New war	80 (.29)***	75 (.26)***
Civil conflict battle intensity _{t-1}	-3.47e-7 (9.66e-6)	
International conflict battle intensity _{t-1}	-7.25e-8 (1.75e-6)	
Civil conflict duration	.0056 (.034)	
Civil conflict duration ²	-9.28e-4 (8.79e-4)	
Log of population _{t-1}	.15 (.17)	
Log of GDP/Capita. _{t-1}	31 (1.62)	
Log of GDP/Capita ² .t-1	.037 (.12)	
Regime type _{t-1}	065 (.028)*	060 (.028)*
Regime type ² _{t-1}	012 (.0057)*	012 (.0054)*
Regime transition or collapse _{t-1}	55 (.34)	51 (.30)(*)
Regime age _{t-1}	014 (.0093)	
Trade openness _{t-1}	0086 (.027)	
Cut point 1	3.02 (5.95)	2.17 (.32)
Cut point 2	3.44 (5.95)	2.59 (.26)
Cut point 3	3.81 (5.95)	2.96 (.26)
Cut point 4	4.31 (5.98)	3.45 (.27)
Cut point 5	4.73 (5.97)	3.86 (.28)
Cut point 6	5.63 (5.96)	4.81 (.36)
Cut point 7	6.62 (5.91)	5.85 (.51)
Cut point 8	8.34 (5.95)	7.51 (.72)
Cut point 9	9.68 (5.99)	8.85 (.74)
Cut point 10	10.44 (6.12)	9.60 (1.00)
n	1063	1105

Notes: Ordinal logit regression. Robust standard errors adjusted for clustering on country in parenthesis. *** p<.005, ** p<.01, * p<.05, (*) p<.10 (two tailed test).

Table 3. Civilian Displacement

Number of civilians displaced	(5) Complete Model	(6) Trimmed Model
Count equation		
Number of civilians displaced _{t-1}	1.00 (5.09e-7)	1.00 (4.23e-7)
Cold war period (1981-1984)	.29 (.091)***	.30 (.094)***
Cold war period (1985-1989)	.51 (.18)(*)	.51 (.16)*
New war period (1995-1999)	.44 (.15)*	.44 (.14)*
Accumulated stock of civilian displacement	1.00 (1.58e-7)	
Years with civilian displacement	1.02 (.093)	
Years with no civilian displacement	.87 (.089)	.85 (.071)(*)
Civil conflict battle intensity _{t-1}	1.00 (1.5e-5)*	1.00 (.1.57e-5)*
International conflict battle intensity _{t-1}	1.00 (.9.91e-6)**	1.00 (8.34e-5)***
Area affected by ethnic civil conflict _{t-1}	1.21 (.096)*	1.19 (.080)**
Area affected by revolutionary civil $conflict_{t-1}$	1.19 (.066)***	1.19 (.064)***
Regime type	.99 (.025)	
Regime transition or collapse _{t-1}	1.47 (.42)	1.56 (.37)(*)
Log of GDP/Capita _{t-1}	.61 (.12)*	.59 (.081)***
Log of population _{t-1}	1.01 (.16)	

Table 3 Continued

Likelihood of no civilian displacement	(5) Complete Model	(6) Trimmed Model
Inflation equation		
Number of civilians displaced _{t-1}	7.35e-7 (4.49e-7)	9.44e-7 (4.56e-7)*
Cold war period (1981-1984)	.81 (.31)**	.73 (.29)*
Cold war period (1985-1989)	.59 (.27)*	.57 (.27)*
New war period (1995-1999)	.67 (.31)*	.70 (.31)*
Accumulated stock of civilian displacement	1.55e-7 (8.69e-8)(*)	
Years with civilian displacement	.052 (.096)	
Years with no civilian displacement	.83 (.32)**	.79 (.23)***
Civil conflict battle intensity _{t-1}	-2.8e-5 (1.8e-5)	-1.84e-5 (1.54e-5)
International conflict battle intensity _{t-1}	-3.11e-6 (4.18e-6)	-1.89e-6 (3.50e-6)
Area affected by ethnic civil conflict _{t-1}	.076 (.048)	.074 (.048)
Area affected by revolutionary civil conflict _{t-1}	088 (.061)	080 (.056)
Regime type	012 (.020)	
Regime transition or collapse _{t-1}	.0058 (.33)	0091 (.28)
Log of GDP/Capita _{t-1}	067 (.14)	13 (.13)
Log of population _{t-1}	.061 (.080)	
Spline 1	.00078 (.0042)	6.54e-4 (.0040)
Spline 2	.086 (.078)	.083 (.066)
Spline 3	022 (.032)	021 (.029)
Constant	-1.45 (1.54)	22 (1.04)
InAlpha n	1.20 (.040)*** 511	1.20 (.041)*** 519

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