ARTICLE

Putting Lethal Force on the Table:
How Drones Change the Alternative Space of War and Counterterrorism

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Abstract

Contrary to the prevailing view that drones spare civilian lives, this paper argues that drones actually place more civilians at risk. The reason is simple: drones are used outside areas of active hostilities in civilian populated areas where no other weapon could be used. The oft-repeated mantra that drones are more precise and less destructive and therefore spare more civilian lives rests on a false comparison. Many commentators wrongly assume that if we were not using drones, we would be using some less precise and more destructive alternative, such as cruise missiles. Apart from the difficulties in deploying cruise missiles covertly and their inability to strike with drone accuracy, cruise missile strikes in civilian populated areas would almost certainly violate the laws of distinction and proportionality and, even if technically legal, would be politically unpalatable. Drones thus put lethal force on the table where it would otherwise be absent and they highlight the lack of law designed to regulate their use. Because the law of armed conflict was developed for active war zones, it is inadequate to govern drone strikes in areas away from active hostilities. As a result, the laws of distinction and proportionality, which govern the use of lethal military force, must be reformulated for drone strikes. Rather than focusing solely on the commander's intent to target enemy combatants, distinction should require a functional analysis of the geographic area to be destroyed by a strike—the death zone. Where the death zone by its nature, location, purpose or use is substantially a civilian object, such as an outdoor market or a civilian apartment building, the death zone as a whole should be deemed a civilian object, regardless of the presence of an otherwise valid military objective, such as an enemy militant. Once a target satisfies distinction, our assessment of proportionality should take into account not only the civilian casualties likely to result from the strike, but also the strategic costs and negative secondary effects of deploying aerial strikes in civilian areas.

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Introduction

The most important legal implications of drone technology have yet to be recognized. Drones are legally interesting not because they are remote-controlled or risk-free, but because they have enabled a covert war and air strikes against combatants who are virtually indistinguishable from civilians.¹ While both the covert use of drones and strikes in civilian areas have been lamented, commentators have either missed or denied the central role that drone technology has played. The fundamental change that drone technology has brought to war and counterterrorism requires us to rethink the law governing the use of force outside active war zones. The law of armed conflict (LOAC), which was designed for active war zones, is inadequate to govern drone strikes in areas away from active hostilities.² As a result, this Article argues that the laws of distinction and proportionality need to be reformulated for drone strikes. Instead of focusing simply on the identity of civilians and combatants, distinction and proportionality should turn on the civilian or military character of the area to be destroyed by an attack. Doing so will both better accord with the protected status of civilians³ and offer greater flexibility than the rules of engagement developed by the Obama administration. While the Obama Administration took tentative steps to address the legal challenges posed by drones through Presidential Policy Guidance and Executive Orders,⁴ durable legal obligations, rather than mere policy, are needed. Far from relaxing or eliminating the more restrictive rules of engagement for

¹ Throughout this Article, “drones” refers to the Predator and Reaper drones that have been used by the U.S. for targeted killing.

² The Supreme Court recognized in *Hamdi* that different “practical circumstances” of warfare may require a revision of the rules governing detention. This Article makes the same argument with respect to the rules governing the use of lethal military force. See *Hamdi v. Rumsfeld*, 542 U.S. 507, 521 (2004) (“[W]e understand Congress’ grant of authority for the use of ‘necessary and appropriate force’ to include the authority to detain for the duration of the relevant conflict, and our understanding is based on longstanding law-of-war principles. If the practical circumstances of a given conflict are entirely unlike those of the conflicts that informed the development of the law of war, that understanding may unravel.”).

³ Protocol Additional (I) to the Geneva Convention of 12 August 1949, and relating to the Protection of Victims of International Armed Conflicts (Protocol I), June 8, 1977, art. 51(1) 1125 U.N.T.S. 3 [hereinafter Additional Protocol I] (“The civilian population and individual civilians shall enjoy general protection against dangers arising from military operations.”).

⁴ A redacted version of the Presidential Policy Guidance, Procedures for Approving Direct Action Against Terrorist Targets Located Outside the United States and Areas Of Active Hostilities, was recently released as a result of a lawsuit by the ACLU, see Am. Civil Liberties Union, Targeted Killing FOIA Database: Presidential Policy Guidance (document dated May 22, 2013; release date Aug. 5, 2016), <https://www.aclu.org/foia-document/presidential-policy-guidance>. An abbreviated version was previously released under the heading, Fact Sheet: U.S. Policy Standards and Procedures for the Use of Force in Counterterrorism Operations Outside the United States and Areas of Active Hostilities [hereinafter Fact Sheet] (May 23, 2013), <https://www.whitehouse.gov/the-press-office/2013/05/23/fact-sheet-us-policy-standards-and-procedures-use-force-counterterrorism>. See also Executive Order 13732, United States Policy on Pre- and Post-Strike Measures to Address Civilian Casualties in U.S. Operations Involving the Use of Force (July 1, 2016), <https://www.whitehouse.gov/the-press-office/2016/07/01/executive-order-united-states-policy-pre-and-post-strike-measures>.

strikes outside active war zones, as the Trump Administration has suggested,⁵ the U.S. should articulate and affirm appropriate legal obligations bearing on such strikes. Doing so would enable the U.S. to meet the legal challenges posed by drones and take the lead in constructing the legal architecture applicable to drones for the future.

While government officials and scholars have lauded drones for their humanitarian virtues,⁶ using drones actually places more civilians at risk. The reason for this is very simple. The oft-repeated mantra that drones are more precise, less destructive, and therefore spare more civilian lives rests on a false comparison. Many commentators wrongly assume that if the United States were not using drones, it would be using some less precise and more destructive alternative, such as cruise missiles. Apart from the difficulties in deploying cruise missiles covertly and their inability to strike with drone accuracy, cruise missile strikes in civilian populated areas would almost certainly violate the laws of distinction and proportionality and, even if technically legal, would be politically unpalatable. Drones have thus filled a void where no other weapon would be used. Drones change the alternative space of deploying lethal military force, putting aerial strikes and attendant civilian harm on the table where they would otherwise be absent.

Part I begins by showing how drone technology has eroded democratic accountability and expanded the use of lethal military force. Because drones pose no risk of American casualties, require no massive troop deployment, and enable high precision targeting with relatively narrow blast radii, they are the perfect weapon for covert counterterrorism operations. The extraordinary ability to use drones covertly has enabled the government's use of lethal military force to proceed virtually unchecked. The ability to kill secretly with drones raises fundamental questions of legal accountability, legitimacy, and oversight in a country structured by separation of powers and democratic self-government.

Although lack of oversight over the use of lethal force is problematic enough in a democracy, the greatest legal challenges posed by drones arise because they are being used where no other weapon could be. Drones can only be used in radically asymmetric contexts with the fighting advantage firmly on their side. Given the technological disparity between drones and those targeted by them, reason dictates that such forces cannot and will not distinguish themselves

⁵ See, e.g., Charlie Savage & Eric Schmitt, *Trump Administration Is Said to Be Working to Loosen Counterterrorism Rules*, N.Y. TIMES (Mar. 12, 2017), <https://www.nytimes.com/2017/03/12/us/politics/trump-loosen-counterterrorism-rules.html> (“The Trump administration is exploring how to dismantle or bypass Obama-era constraints intended to prevent civilian deaths from drone attacks, commando raids and other counterterrorism missions outside conventional war zones like Afghanistan and Iraq . . .”).

⁶ See, e.g., President Barack Obama, Remarks at the National Defense University (May 23, 2013), <http://www.whitehouse.gov/the-press-office/2013/05/23/remarks-President-national-defense-university> (“Conventional airpower or missiles are far less precise than drones, and are likely to cause more civilian casualties and more local outrage.”).

from civilians. Because drones allow more precise and lower impact targeting than other unmanned weapons, they have enabled the targeting of individual enemy combatants in civilian populated areas to become a policy norm for the first time.

Having shown how drones raise unique legal issues related to the use of military force and democratic accountability, I briefly review the most prominent defenses and criticisms of drones. A common failing of both is that they do not adequately engage the unique characteristics of drone technology and the limited circumstances in which drones can be used. As a result, drone defenders are led to believe that drones are simply one weapon among many interchangeable alternatives, and critics level charges against drones that are both dubious in their own right and equally true of older weapons long in use.

Part I concludes by testing the thesis that drones put more civilians at risk by comparing recent rates of civilian deaths with drones to rates of civilian deaths with manned aircraft. Although manned aircraft lack the surveillance capability of drones and thus should be expected to result in less accurate targeting, a direct comparison shows that civilian death rates from drone attacks fall within the same range of civilian death rates in NATO's manned intervention in Kosovo. This is true despite the fact that the Kosovo campaign was criticized for higher death rates because NATO assumed a "zero casualty" policy with respect to its own sorties.⁷ The argument that drones are more precise, less destructive, and therefore spare more civilians turns out to be false not only on its own terms, but also when compared to other aerial attacks.

Given the unprecedented use of lethal force in civilian populated areas introduced by drones, Part II examines the Presidential Policy Guidance (PPG) developed by the Obama Administration to govern their use. The special challenges posed by drones are apparent in the PPG. The PPG recognizes that a LOAC framework is required to authorize lethal force against terrorists who are not posing an immediate threat of serious bodily harm. However, the PPG restricts the LOAC framework with law enforcement principles, such as the requirement that no civilians be killed or injured by drone strikes. Despite its attempt to respond to the unique legal issues posed by drones, the PPG ultimately fails legally because neither the law enforcement nor the LOAC framework was developed for the use of lethal military force outside areas of active hostilities. The PPG also fails on policy grounds because, by declining to articulate and avow the legal obligations bearing on drone strikes in areas away from active combat, the Obama Administration squandered a critical opportunity to contribute to the

⁷ Human Rights Watch reported that "there is a question as to whether NATO's extraordinary efforts to avoid casualties among its pilots precluded low-flying operations that might have helped to identify targets more accurately. . . . In the case of attacks such as those at Djakovica-Decane, in which flying at a higher altitude seems to have impeded a pilot from adequately identifying a target, the conclusion again is that inadequate precautions were taken to avoid civilian casualties." HUMAN RIGHTS WATCH, THE CRISIS IN KOSOVO, <https://www.hrw.org/reports/2000/nato/Natbm200-01.htm> (last visited May 15, 2017).

formation of customary international law that would govern drones going forward.⁸ Rather than making ad hoc policy restrictions on the use of force or loosening those restrictions,⁹ the U.S. should reformulate distinction and proportionality for drone strikes away from active hostilities and explicitly avow those reformulations as legal obligations bearing on U.S. military operations.

Part III argues that the legal baselines established by the laws of distinction and proportionality need to be reformulated for three central reasons. First, the LOAC specifically grants civilian populations protection from attack, even when enemy combatants are present among them.¹⁰ Second, the LOAC was developed for areas of active hostilities where civilians were presumed to be on notice of the dangers accompanying armed conflict and generally distinguishable from enemy combatants. Third, the LOAC does not adequately account for the strategic costs and negative secondary effects of aerial strikes in civilian areas, and thus fails to yield an accurate account of the military advantage of a strike because overly focused on short-term gains. As a result, when the laws of distinction and proportionality are applied to strikes outside active combat areas, they are insufficient both to protect civilians and to serve our military advantage.

Part IV articulates how distinction and proportionality need to be reformulated for drone strikes outside active combat areas. Distinction is understood to require only commander intent to target a legitimate military objective. On that understanding, distinction is satisfied if a commander intends to target a single enemy combatant in a crowded marketplace populated by civilians. When civilians and combatants are intermixed, as they often are in areas away from active hostilities, a focus on commander intent will do little or nothing to protect civilians from the harms of war. In such areas, rather than focusing solely on the commander's intent to target enemy combatants, distinction should require a functional analysis of the geographic area to be destroyed by a strike—the death zone. Where the death zone contains an object that is substantially civilian by its

⁸ The difference between domestic policy regulations—as enshrined in Executive Orders and Presidential Policy Guidance—and statements of legal obligations under international law is crucial to the United States' ability to contribute to the customary international law governing drones going forward. In order to contribute to customary international law, a state must not only exhibit consistent practice, but also do so out of a sense of legal obligation, or *opinio juris*. See, e.g., Statute of the International Court of Justice, art. 38(1)(b) (defining customary international law as “practice accepted as law.”). However, both Executive Order 13732 and the PPG emphasize that they are only policy. Executive Order 13732 also explicitly states that “[t]he policies set forth in this order are . . . not intended to create new international legal obligations.” Executive Order 13732, *supra* note 4. These domestic policy instruments are thus ill-suited for the articulation of an international legal architecture that would govern the use of drones by both friendly and more antagonistic parties.

⁹ Savage & Schmitt, *supra* note 5.

¹⁰ See, e.g., Additional Protocol I, *supra* note 3, at arts. 50(1), 51(1) (“The presence within the civilian population of individuals who do not come within the definition of civilians does not deprive the population of its civilian character.”). See also Prosecutor v. Galić, Case No. IT-98-29-T, Judgment and Opinion, ¶ 50 (Int’l Crim. Trib. for the Former Yugoslavia Dec. 5, 2003) [hereinafter Galić] (“The presence of individual combatants within the population does not change its civilian character.”).

nature, location, purpose or use, such as an outdoor market or a civilian apartment building, then the death zone as a whole should be deemed a protected civilian object, regardless of the presence of an otherwise valid military objective, such as an enemy militant.

Proportionality should also be reformulated for drone strikes away from active hostilities. Whereas proportionality now requires a focus only on the immediate effects of a strike, such a focus is inadequate in the face of a growing body of data showing long-term negative effects, such as increased terrorist recruitment and violence in the wake of aerial strikes.¹¹ An accurate assessment of the military advantage of a strike thus requires us to take into account not simply the short-term, but also the long-term effects of a strike. Given that we use lethal force in counterterrorism operations with the aim of restoring our peace and security, the military advantage of a strike should be measured in terms of its contribution to our long-term security. While analysis of the long-term secondary effects of a strike may be more demanding than analysis of immediate effects, the relevant data is increasingly available and should be welcomed by military commanders and political leaders who seek to direct the use of force more effectively so that conflicts come to an end rather than proceed indefinitely.

In conclusion, the Article shows that the proposed reformulations of distinction and proportionality for drone strikes away from active hostilities are more flexible than the guidelines provided by the PPG, more likely to produce effective uses of force with fewer civilian casualties, and thus better serve our national security interests and our goals of peace and security.

I. How Drones Put More Civilians at Risk

Although drones have been defended as a humanitarian advance in warfare, a closer look shows that drones put more civilian lives at risk. This is the case because drones are used in civilian populated areas where no other weapon would be used. Drone defenders have generally overlooked the unique circumstances in which drones can be used. They thus incorrectly conclude that drones are both interchangeable with other weapons and better than the alternatives at sparing lives. However, a direct comparison of civilian casualties from drones with civilian casualties from manned aircraft shows that drones are not demonstrably better at sparing civilians. To see why the LOAC must be reformulated to address the unique risks generated by drones, a closer look at drone technology is needed.

¹¹ See, e.g., C. KOLENDA ET AL., OPEN SOC'Y FOUND., THE STRATEGIC COSTS OF CIVILIAN HARM 23–25 (2016). See also Jason Lyall, *Bombing to Lose? Airpower, Civilian Casualties, and the Dynamics of Violence in Counterinsurgency Wars*, Yale University (Mar. 27, 2015) at 4, http://www.du.edu/korbel/sie/media/documents/research_seminar_papers/lyall-airstrikes-apr2015.pdf (“No matter how precise, airstrikes will kill civilians, shifting support away from the counterinsurgent while creating new grievances that fuel insurgent recruitment.”).

A. *Why Drones Are Different*

Drones require increased legal scrutiny not because they are remote-control or risk-free, but because they have led to a breakdown of democratic accountability and oversight, while fundamentally changing the options for the use of lethal military force. Understanding why drones are different is essential to confronting the unique legal challenges they pose and the legal innovations that are needed to properly regulate them.

1. Drones Enable an Indefinite Covert War

In contrast to regular military operations, which are generally exposed to public scrutiny because they are openly acknowledged by the government, drone strikes remain veiled in official government secrecy. Although the more than 600 drone strikes over the last decade are hardly unknown to the public,¹² and the program itself has even been openly discussed by top government officials including President Obama, all but a handful of drone strikes remain classified.¹³ As such, the government places itself in an official position of deniability, cutting off real public scrutiny and democratic oversight. For example, in FOIA litigation brought by the ACLU, the CIA argued:

[n]otwithstanding widespread reports that drone strikes occur, the CIA has never confirmed or denied whether it has any involvement or intelligence interest in any of those drone strikes, or whether it maintains any records relating to those drone strikes. . . . The Court should reject plaintiffs' attempt to cobble together an official CIA acknowledgment by combining together the substance of various news reports, unofficial statements, and imprecise statements by former CIA Director Panetta and President Obama.¹⁴

The government's ability to maintain a position of deniability flows directly from the unique blend of drone technology. Drones pose no risk of American military casualties, require no massive troop deployment or fleet movement, and enable high precision targeting with a relatively narrow blast radius.

¹² See *The Bureau of Investigative Journalism's drone strike data*, <https://www.thebureauinvestigates.com/projects/drone-war>. See also Bill Roggio, *The Long War Journal*, Foundation for Defense of Democracies, *Charting the data for US airstrikes in Pakistan, 2004 – 2017*, <http://www.longwarjournal.org/pakistan-strikes/> (last visited Apr. 17, 2017), and *The New America Foundation's Data*, <http://securitydata.newamerica.net/>.

¹³ The only exceptions are President Obama's declassification of a limited number of strikes that have killed American citizens, including those against Anwar al-Aulaqi, a strike that killed al-Aulaqi's 16-year-old son, and a strike that killed American and Italian journalists, Warren Weinstein and Giovanni Lo Porto. See Peter Baker, *Obama Apologizes After Drone Kills American and Italian Held by Al Qaeda*, N.Y. TIMES (Apr. 23, 2015), www.nytimes.com/2015/04/24/world/asia/2-qaeda-hostages-were-accidentally-killed-in-us-raid-white-house-says.html. See also Obama, Remarks at the National Defense University, *supra* note 6.

¹⁴ Brief for Appellee at 43–44, *ACLU v. CIA*, (No. 11-5320), 2012 WL 1853574 (D.C. Cir. 2012).

Some observers argue the drone program is not unique and that the government can kill covertly just as easily with Navy SEALs or cruise missiles as it can with drones. However, according to the Office of the Director of National Intelligence, there were more than 500 drone strikes outside areas of active hostilities during the Obama Administration alone.¹⁵ It is altogether unimaginable that the administration could have successfully carried out a similar number of covert special forces strikes or cruise missile attacks. As the raid on Osama bin Laden and a more recent raid in Yemen demonstrate,¹⁶ when Navy SEALs or other special forces are deployed for a covert operation, inevitable accidents and casualties lead to a much higher chance of public scrutiny and eliminate deniability. In the case of cruise missiles, a typical Tomahawk cruise missile carries a 1,000-pound warhead with a blast radius of several hundred feet, while drones typically fire Hellfire missiles with just a 20-pound warhead and a blast radius of 50 feet. Cruise missiles are so much more destructive and substantially less accurate than a typical drone strike that it is extraordinarily difficult for a government that uses them to maintain plausible deniability.¹⁷ In contrast to special forces strikes and cruise missiles, drones pose no risk of American military casualties, offer accurate and limited targeting, and enable far greater deniability.

Unlike any other weapon, drones enable our government to conduct a war of indefinite geographic and temporal scope without the American citizenry ever being informed of how and when drones are used. Drones thus hover in the shadow of government secrecy, just sufficiently under the radar to evade any

¹⁵ See Office of the Dir. Nat'l Intelligence, Summary of Information Regarding U.S. Counterterrorism Strikes Outside Areas of Active Hostilities, <https://www.dni.gov/index.php/newsroom/reports-and-publications/214-reports-publications-2016/1392-summary-of-information-regarding-u-s-counterterrorism-strikes-outside-areas-of-active-hostilities>; Office of the Dir. Nat'l Intelligence, Summary of 2016 Information Regarding United States Counterterrorism Strikes Outside Areas of Active Hostilities, <https://www.dni.gov/files/documents/Summary%20of%202016%20Information%20Regarding%20United%20States%20Counterterrorism%20Strikes%20Outside%20Areas%20of%20Active%20Hostilities.pdf>. See also Charlie Savage & Scott Shane, *U.S. Reveals Death Toll From Airstrikes Outside War Zones*, N.Y. TIMES (July 1, 2016), <http://www.nytimes.com/2016/07/02/world/us-reveals-death-toll-from-airstrikes-outside-of-war-zones.html>.

¹⁶ One of the stealth helicopters used in the bin Laden raid crashed and was partially destroyed by the Navy SEALs conducting the operation. See Christopher Drew, *Attack on Bin Laden Used Stealthy Helicopter That Had Been a Secret*, N.Y. TIMES (May 5, 2011), <http://www.nytimes.com/2011/05/06/world/asia/06helicopter.html>. On the recent Yemen raid, see Eric Schmitt & David Sanger, *Raid in Yemen: Risky From the Start and Costly in the End*, N.Y. TIMES (Feb. 1, 2017), <https://www.nytimes.com/2017/02/01/world/middleeast/donald-trump-yemen-commando-raid-questions.html>.

¹⁷ While Hellfires claim accuracy within two meters and are developed to hit moving targets, cruise missiles can currently only hit stationary targets with a margin of error of ten meters. See Thomas Gillespie, Katrina Laygo, Noel Rayo & Erin Garcia, *Drone Bombings in the Federally Administered Tribal Areas: Public Remote Sensing Applications for Security Monitoring*, 4 J. Geographic Information System 136, 139 (2012), <http://www.scirp.org/journal/PaperInformation.aspx?paperID=18766>. See also United States Navy Fact File, *Tomahawk Cruise Missile*, http://www.navy.mil/navydata/fact_display.asp?cid=2200&tid=1300&ct=2.

sustained or widespread scrutiny. Drone technology does not, of course, cause the secrecy with which it is put to use. It has, however, enabled unprecedented government secrecy and deniability in the use of force. Government deniability and a lack of credible public information about drone strikes make legal accountability and democratic oversight impossible.

The secret use of lethal force enabled by drones is in fundamental conflict with the oversight and legal accountability required by constitutional separation of powers. As Justice Douglas found in the *Pentagon Papers* case, “[s]ecrecy in government is fundamentally anti-democratic Open debate and discussion of public issues are vital to our national health.”¹⁸ Justice Stewart specifically affirmed the fundamental role of public oversight with respect to “the two related areas of national defense and international relations.” He argued that “the only effective restraint upon executive policy and power . . . may lie in an enlightened citizenry—in an informed and critical public opinion which alone can here protect the values of democratic government.”¹⁹ An informed citizenry plays a fundamental role in holding the Executive accountable. The covert use of force enabled by drones short-circuits the role that the people are supposed to have in authorizing military action and leaves two branches of government entirely unchecked by the judiciary. As Professor Rosa Brooks argued in her testimony before Congress, because “U.S. targeted killings take place under a cloak of secrecy, it is impossible for outsiders to evaluate the facts or apply the law to specific facts.”²⁰ The secrecy surrounding the drone program makes the government’s assertions about it “entirely non-falsifiable.”²¹ We are thus left simply having to trust the government’s reassurances that the program is entirely legal without any opportunity for public or judicial scrutiny. As Brooks stated, “‘trust us’ is a rather shaky foundation for the rule of law. Indeed, the whole point of the rule of law is that individual lives and freedom should not depend solely on the good faith and benevolence of government officials.”²² Unless the public has access to the facts surrounding military activity there is little hope of effectively challenging its lawfulness. Moreover, the reporting of covert activity to members of Congress is no substitute for placing the essential facts of military activity in

¹⁸ *New York Times Co. v. United States*, 403 U.S. 713, 724 (1971) (Douglas, J., concurring). *Cf. id.* at 727–28 (Stewart, J., concurring), 731 (White, J., concurring).

¹⁹ *Id.* at 727–28 (1971) (Stewart, J., joined by White, J., concurring). *Cf. id.* at 731 (White, J., joined by Stewart, J., concurring) (“Nor, after examining the materials the Government characterizes as the most sensitive and destructive, can I deny that revelation of these documents will do substantial damage to public interests. Indeed, I am confident that their disclosure will have that result. But I nevertheless agree that the United States has not satisfied the very heavy burden that it must meet to warrant an injunction against publication in these cases.”).

²⁰ *Drone Wars: The Constitutional and Counterterrorism Implications of Targeted Killing Before the S. Judiciary Subcommittee on the Constitution, Civil Rights, and Human Rights*, 113th Cong., 15 (Apr. 23, 2013) (statement of Professor Rosa Brooks), <http://scholarship.law.georgetown.edu/cgi/viewcontent.cgi?article=1114&context=cong>.

²¹ *Id.* at 11.

²² *Id.* at 15.

the public domain.²³ Members of Congress who receive reports on covert military activity are bound to keep that information secret. Judicial precedent also suggests that members of Congress would be found to lack standing to challenge the legality of covert military activity.²⁴ Drone technology has driven the unprecedented covert use of lethal military force and furthered the breakdown of democratic accountability in the war against terrorism.

2. Drones Can Only Be Used in Radically Asymmetric Contexts

Lack of public information and oversight over lethal drones is problematic enough in a democracy. The issue with drones is not, however, simply their ability to escape meaningful public assessment. While drone strikes can and should be carried out consistently with democratic oversight, drone technology can only be deployed in radically asymmetric contexts where civilians and combatants will be intermixed. The limited circumstances in which drones can be used and the new risk they impose on civilians require us to rethink distinction and proportionality. To understand why Predator and Reaper drones are the only weapons that could be used for targeted killing in civilian populated areas, we have to look more closely at their specific technological characteristics.

Drone technology combines a paradoxical mixture of futuristic surveillance and targeting technology with World War I era aerial sophistication. The Predator and Reaper drones currently used in Pakistan, Afghanistan, Yemen, and Somalia are slow-flying, propeller-driven aircraft with relatively low service ceilings. With top speeds of just 135 and 200 mph, respectively, they can practically hover in place for twenty-four hours at a time, thereby providing extremely detailed reconnaissance and enabling high precision targeting.²⁵ The very same factors that make the drones so precise, however, also make them easy targets for jet fighters and ground-based air defenses.²⁶ The drones used to target and kill members of al-Qaeda and the Taliban could pose no serious threat against an air force with World War II era sophistication or moderately advanced anti-aircraft artillery. If those presently targeted by drones possessed the same Stinger missiles that the Afghans used effectively against Soviet aircraft in the 1980s, the U.S. would have to suspend its use of drones altogether. While no other aircraft

²³ See, for instance, the reporting requirements imposed by the Intelligence Oversight Act of 1980, 50 U.S.C. § 3091, and the Intelligence Authorization Act for Fiscal Year 1991, P.L. 102-88 (1991).

²⁴ See, e.g., *Campbell v. Clinton*, 203 F. 3d 19 (D.C. Cir. 2000). Cf. *Lowry v. Reagan*, 676 F. Supp. 333, 339 (D.D.C. 1987).

²⁵ See U.S. Air Force MQ-1B Predator Fact Sheet, <http://www.af.mil/About-Us/Fact-Sheets/Display/Article/104469/mq-1b-predator/> and U.S. Air Force MQ-9 Reaper Fact Sheet, <http://www.af.mil/About-Us/Fact-Sheets/Display/Article/104470/mq-9-reaper/>.

²⁶ As Micah Zenko has noted, the drones currently in use lack “the speed, stealth, and decoy capabilities to protect themselves against even relatively simple air defense systems.” Micah Zenko, COUNCIL ON FOREIGN REL., *Reforming U.S. Drone Strike Policies*, Council Special Report No. 65, 7 (Jan. 2013). See also Brian Palmer, *Is It Hard to Kill a Drone?*, SLATE (June 6, 2012), http://www.slate.com/articles/news_and_politics/explainer/2012/06/cia_drone_program_is_it_hard_to_shoot_one_down.html.

can match drones' reconnaissance and accuracy, they are so poor at evading threats that the Air Force only flies them in "permissive airspace."²⁷ As U.S. Air Force General Norton Schwartz has commented, drones "are not survivable in a threat environment."²⁸ Drones can thus only be effective in radically asymmetric contexts with the military advantage firmly on their side.

In the radically asymmetric context in which drone strikes are feasible, it would be obvious suicide for rudimentary fighting forces like ISIL or al-Qaeda to overtly distinguish themselves. Militants massing in training camps or on open battlefields would be easy targets and quickly swept away by drones and other superior military weapons.²⁹ It thus stands to reason that radically outgunned militias cannot and will not distinguish themselves from civilian populations. In fact, this is what we find in practice. As reports on Libyan forces targeted by NATO in 2011 attest, "[a]fter the outbreak of the NATO air war, Qaddafi's forces quickly abandoned their tanks and heavy equipment, as NATO promptly targeted them with conventional aircraft, to mingle with civilians in ways that made locating them much more difficult."³⁰ Once Libyan forces abandoned their heavy military equipment, drones were then used to target them among the civilian population.³¹ Like the Libyan fighters targeted by NATO, the al-Qaeda and associated forces targeted by drones have retreated from "hot battlefields." However, they are generally not alone. They are often surrounded by family, including women and children, and in villages surrounded by people going about their daily life often with no greater connection to militants than circumstantial proximity. As Kenneth Anderson admits, the people targeted by drones are "more likely to be surrounded with civilians, whether explicitly as human shields or not"³² Because no other weapon could be used to carry out the strikes performed by drones in civilian populated areas, drones place a new and unique lethal risk on the civilian population, putting more civilian lives at risk than if drones were not deployed.

Drone technology leads inexorably to the reality that drones will only be used against enemies who are virtually indistinguishable from civilians, thus

²⁷ U.S. Air Force Gen. Norton Schwartz commented that drones "are not survivable in a threat environment." Tom Bowman, *Air Force Chief Leaves Legacy In The Sky: Drones*, NAT'L PUBLIC RADIO (Aug. 10, 2012), <http://www.npr.org/2012/08/10/158521495/air-force-chief-leaves-legacy-in-the-sky-drones>. See also David Axe, *Predator Drones Once Shot Back at Jets... But Sucked At It*, WIRED (Nov. 9, 2012), <http://www.wired.com/dangerroom/2012/11/predator-defenseless/>.

²⁸ See Bowman, *supra* note 28. See also Axe, *supra* note 28.

²⁹ This occurred recently when approximately 150 al Shabab fighters in Somalia were assembled for what the U.S. military believes was a graduation ceremony. See Helene Cooper, *U.S. Strikes in Somalia Kill 150 Shabab Fighters*, N.Y. TIMES (Mar. 7, 2016), <http://www.nytimes.com/2016/03/08/world/africa/us-airstrikes-somalia.html>.

³⁰ See, e.g., Kenneth Anderson, *Efficiency in Bello and ad Bellum: Making the Use of Force Too Easy?*, in TARGETED KILLINGS 374, 385 (Claire Finkelstein et al. eds., 2012) ("The undefended factual assumption of this argument is that targeted killing using drones results in significantly—vastly—less collateral damage and civilian deaths than other forms of attack.").

³¹ *Id.* at 385.

³² *Id.* at 384.

generating complex legal and ethical implications. The ISIL, al-Qaeda, and associated forces targeted by drones are no less legal and ethical targets because they are radically outgunned by drones. However, the civilians in their vicinity are neither legal nor ethical targets and are legally entitled to the strongest protections.³³ This is particularly the case in areas away from active hostilities where attacking forces will deem the obligation to warn civilians prior to attack infeasible,³⁴ thus leaving civilians not only without notice of a lethal threat, but also defenseless and unable to flee or take cover.

The unique context of drone use, in which we know that the enemy will generally be found among civilians, requires us to rethink the basic *jus in bello* requirements of distinction and proportionality.³⁵ Drone technology is unique in this sense. Contrary to other long range remote control weapons such as cruise missiles, drones can *only* be used against an enemy which reason dictates cannot and will not distinguish itself from civilian populations. A military that takes responsibility for the foreseeable consequences of its actions must anticipate an unusually difficult task in distinguishing its enemy foe from innocent civilians when using drones.³⁶ Although President Obama repeatedly affirmed a commitment to limiting civilian casualties,³⁷ targeting the enemy with drones places an unprecedented risk on civilians that would not exist without them. Before turning to the legal developments that are needed to properly regulate the use of lethal military force with drones, the following section examines how discussions of drones to date have failed to come to terms with the unique technological characteristics of drones, the new threat to civilians they pose, and the legal issues that arise as a result.

³³ For example, the principle of distinction holds that “[p]arties to the conflict shall at all times distinguish between the civilian population and combatants and between civilian objects and military objectives and accordingly shall direct their operations only against military objectives.” Additional Protocol I, *supra* note 3, at art. 48. *See also id.*, arts. 44(3), 48, 51(3), 51(5)(a), 52(2), 57(2)(a)(ii), 57(3).

³⁴ The obligation of precaution in attack is codified in *id.*, arts. 57, 58.

³⁵ Cf. Gabriella Blum, *On a Differential Law of War*, 52 HARV. INT’L L.J. 163, 166 (2011). Contrary to Blum, I am not advocating differential or heightened legal obligations for the U.S. because of their technological edge. Rather, I am arguing that distinction and proportionality need to be rethought because civilians away from active hostilities are routinely placed at an unprecedented risk in ways that are not contemplated by the current laws of distinction and proportionality.

³⁶ For examples of U.S. drone strikes that hit and killed unintended targets, see Zaid Ali & Laura King, *U.S. Drone Strike on Yemen Wedding Party Kills 17*, L.A. TIMES (Dec. 13, 2013), <http://articles.latimes.com/2013/dec/13/world/la-fg-wn-yemen-drone-strike-wedding-20131213>. *See also* Mark Mazzetti, Charlie Savage & Scott Shane, *How a U.S. Citizen Came To Be in America’s Cross Hairs*, N.Y. TIMES (Mar. 9, 2013), <http://www.nytimes.com/2013/03/10/world/middleeast/anwar-al-awlaki-a-us-citizen-in-americas-cross-hairs.html>.

³⁷ *See* Obama, Remarks at the National Defense University, *supra* note 6. *See also* Executive Order 13732, *supra* note 4.

B. Drones: Neither New nor Different?

Government and scholarly discussions have obscured the unique technological characteristics of drones and the need to reexamine the law governing their use. After an abstract review of drones' risk-free and remote control features, most drone defenders quickly conclude that drones are neither new nor different and thus present no novel legal challenges. Drone defenders thus assume, without a closer examination of drone technology and the reality of its use, that drones' accuracy and supposed ability to distinguish between combatants and civilians means that drones must be more humane and spare more civilians than other weapons.³⁸ A closer look at the most prominent defenses and criticisms of drones shows how the impact of drone technology has been underestimated.

Perhaps the most common strategy of defending drones is to claim that drones are not new in any technologically or legally interesting way. Thus, Avery Plaw argues:

To begin with, UAVs [unmanned aerial vehicles] are not so new. The first experimental models of UAVs appeared in 1917. . . . During all of this time UAVs have been subject to the same legal rules and ethical norms that are commonly understood to apply to the general use of weapons in combat (e.g., the principles of necessity, distinction, proportionality, humanity). So it is not obvious why we should expect new principles and concepts to arise now.³⁹

Kenneth Anderson goes a step further in arguing that “[m]issiles fired from a remotely piloted [drone] present the same legal issues as any other weapons system—the law of war categories of necessity, distinction and proportionality in targeting.”⁴⁰ Drone defenders like Plaw and Anderson attempt to head off criticisms by pointing out that the supposedly new characteristics most commonly associated with drones, for example that they are remote-controlled and risk-free for drone operators, are characteristics shared by many other weapons that have been in use for decades. They point out that remote-controlled unmanned weapons, such as track mines, date back to the First and Second World Wars.⁴¹ They also argue that cruise missiles fired from hundreds of miles away and high

³⁸ See, e.g., Anderson, *supra* note 30, at 382 (“The undefended factual assumption of this argument is that targeted killing using drones results in significantly—vastly—less collateral damage and civilian deaths than other forms of attack.”).

³⁹ Asa Kasher & Avery Plaw, *Distinguishing Drones: An Exchange*, in KILLING BY REMOTE CONTROL 47, 48–49 (Bradley J. Strawser ed., 2013).

⁴⁰ Anderson, *supra* note 30, at 380.

⁴¹ MILITARY HISTORY NOW, WAR BY REMOTE CONTROL — 2,500 YEARS OF UNMANNED VEHICLES, <http://militaryhistorynow.com/2012/09/09/war-by-remote-control-2500-years-of-unmanned-vehicles/> (last visited Mar. 29, 2017).

altitude bombers deployed well above the enemy's air defenses are just as risk-free as drones. Since remote controlled and risk-free weapons have long been part of war, defenders conclude that drones cannot raise any novel legal or ethical questions, at least not ones that stem from the technology's intrinsic characteristics.

By focusing on the superficial remote-control and risk-free attributes of drones rather than the unique context in which drone technology can be deployed, drone defenders erroneously conclude that drones are interchangeable with other weapons such as cruise missiles, smart bombs, or even a special forces strike. Thus, in commenting on targeted killing carried out by drones, Bradley Strawser argues that the same killing "could be carried out by other kinds of weapon platforms or even soldiers on the ground with any weapon."⁴² This "interchangeability thesis," as I will call it, presents the use of drones as one choice among other equally viable alternatives.

The interchangeability thesis allows drone defenders to compare drones to other weapons and argue that drones compare favorably in the most legally, ethically, and politically relevant categories. Since drones are more accurate than cruise missiles and smart bombs,⁴³ they are thought to enable more precise distinction between enemies and civilians.⁴⁴ Because drones are supposed to enable more precise distinction between enemies and civilians, they are thought to lower the risk of disproportionate civilian casualties.⁴⁵ Drone defenders are thus led to confidently conclude that "targeted killing using drone technologies significantly reduces civilian casualties and civilian harms in comparison to alternative means of using force."⁴⁶

Armed with the interchangeability thesis and the assumption that drones spare more civilian lives, drone defenders appear to easily parry the most frequently rehearsed criticisms of drones. When confronted with the claim that drones decrease the human and political costs of war and thus makes states with drones more likely to wage war, drone defenders point out the obvious speculation of the charge. They quickly add that even if the charge is true, it is not necessarily a mark against drones. Putting troops in harm's way has long been a deterrent to military activity. For instance, it has become a truism that the U.S.

⁴² Bradley J. Strawser, *Introduction: The Moral Landscape of Unmanned Weapons*, in *KILLING BY REMOTE CONTROL* 3, 18 (Bradley J. Strawser ed., 2013).

⁴³ See Kasher & Plaw, *supra* note 39, at 59 ("[D]rones are more amenable than other types of weaponry to accurate remote control.").

⁴⁴ Zack Beauchamp & Julian Savulescu, *Robot Guardians: Teleoperated Combat Vehicles in Humanitarian Military Intervention*, in *KILLING BY REMOTE CONTROL* 106, 119 (Bradley J. Strawser ed., 2013) ("[Drones] are well suited . . . for distinguishing between enemies and civilians.").

⁴⁵ See Kasher & Plaw, *supra* note 39, at 59.

⁴⁶ Anderson, *supra* note 30, at 387. Some have gone further and argued that drones are the ideal weapons for humanitarian interventions, because they remove compatriot soldiers from harm's way and are thought to be best at "minimizing civilian casualties." See, e.g., Beauchamp & Savulescu, *supra* note 44, at 120.

failed to intervene to stop the genocide in Rwanda because of the loss of American troops and political repercussions of the “Black Hawk Down” experience in Somalia a year earlier.⁴⁷ Concerns with protecting troops also led to a “zero casualty policy” in NATO’s intervention in Kosovo, requiring all sorties to be flown above 15,000 feet so as to be safely out of reach of enemy air defenses. Thus it is at least plausible that drones, which eliminate troop risk, would lead a state with drones to resort to military force more readily. However, as the examples above suggest, a state’s willingness to resort to military force to stop genocide may be a very positive development.⁴⁸ These considerations enable drone defenders to conclude that unless there is evidence that states with drones will undertake more unjust wars, lowering the threshold of using military force may be a mark for, rather than against, the use of drones.

When faced with the criticism that riskless drone warfare is inherently unjust because the privilege to wage war is ultimately based on the mutual risk of opposing soldiers,⁴⁹ drone defenders again rely on the interchangeability thesis. They argue that as long as the use of force is otherwise justified, there is a moral imperative to substitute unmanned systems that offer additional troop protection when doing so will not sacrifice mission effectiveness or increase anticipated civilian casualties.⁵⁰

Even when faced with what seems virtually undeniable, that drones have contributed to stifling serious public debate about the use of lethal military force, drone defenders do not back down.⁵¹ Defenders respond that drones are no different from cruise missiles or smart bombs that are remote-controlled and fired or dropped by combatants far from harm’s way. Thus they argue that if serious democratic deliberation about the use of lethal military force has broken down,

⁴⁷ See, e.g., Samantha Power, *A PROBLEM FROM HELL* 335 (2003) (“Remembering Somalia and hearing no American demands for intervention, President Clinton and his advisers knew that the military and the political risks of involving the United States in a bloody conflict in central Africa were great, yet there were no costs to avoiding Rwanda altogether.”).

⁴⁸ See, e.g., Beauchamp & Savulescu, *supra* note 44, at 124.

⁴⁹ See Jeff McMahan, *Forward*, in *KILLING BY REMOTE CONTROL* xiv (Bradley J. Strawser ed., 2013). Cf. Paul Kahn, *The Paradox of Riskless Warfare*, 22 *PHIL. & PUB. POL’Y QUARTERLY* 2 (2002).

⁵⁰ See Strawser, *supra* note 42, at 19 (All other things being equal, “there is a moral obligation to use the remote weapon to avoid putting the operator of that weapon at unnecessary risk.”).

⁵¹ Jeff McMahan argues that because drones take compatriot casualties out of the equation, a state will be able to wage war without having to convince citizens to take up arms, risk their lives, or accept the sacrifice of their fellow citizens. See McMahan, *supra* note 50, at xiv. A slightly different version of this argument emphasizes the physical remoteness of war fought with remote control weapons, suggesting that the very distance from conflict removes the population from the horrors of war and thus makes war more abstract and palatable. See P.W. SINGER, *WIRED FOR WAR* 322 (2009). Yet another version of this argument emphasizes the extent to which riskless warfare will lead to less serious public deliberation over the decision to go to war and thus popular indifference to war. See *id.* at 323. Singer suggests that the decision to go to war may become no graver than the decision “to raise the bridge tolls.” *Id.* Cf. Beauchamp & Savulescu, *supra* note 44, at 122–24.

that is a problem for “public participation in democratic deliberation, not drones.”⁵²

Finally, when faced with the criticism that drones remove risk to soldiers only to shift it onto civilians, thus violating civilian immunity, drone defenders again resort to interchangeability to dodge the attack. They claim that if drones really do shift risk from soldiers onto civilians in an unjust way, drones are by no means distinct in that regard. The same issue would be raised by cruise missiles, smart bombs, and other risk-averting measures like the 15,000-foot service floor in NATO’s Kosovo intervention.⁵³ Defenders also point out that these risk averse measures have not been deemed to violate the law of armed conflict and are, in any case, a vast improvement over the war tactics employed during the Second World War.⁵⁴

Despite the initial plausibility of some of these arguments, both drone critics and defenders miss the mark because they fail to come to terms with the unique characteristics of drone technology and the very limited circumstances in which it can be used. Without looking more closely at drone technology, it can appear as if drones are no different from other remote control weapons and are simply one of many interchangeable alternatives equally available to political and military leaders. As we have seen, however, the interchangeability thesis and the inferences that flow from it are false. Other weapons, such as cruise missiles and smart bombs, would not and could not be used in place of drones. Not only do such weapons forfeit the deniability that drones enable, they are generally far too destructive for use in civilian populated areas. Unlike other weapons technology, drones have made the use of lethal military force democratically unaccountable and put civilian lives at risk in an unprecedented way. Before turning to the challenge of properly regulating lethal drones, the following section responds to those who may still believe that drones spare more civilian lives by looking at actual data on drone casualties. A direct comparison of civilian death rates from drones and manned aircraft demonstrates that drones have not ushered in a new age of humane warfare.

C. Drones Are Not a Humane Alternative to Manned Aircraft

The central argument in favor of drones is that they spare more civilian lives than other weapons. We have already seen that this claim rests on a dubious foundation, since most other remote-control weapons, such as cruise missiles or smart bombs, could not be substituted for drones because they would be unlawful, politically unacceptable, and frequently too inaccurate to hit the intended target.⁵⁵

⁵² *Id.*

⁵³ Kasher & Plaw, *supra* note 39, at 57.

⁵⁴ Anderson, *supra* note 30, at 383–84.

⁵⁵ For an account of how Israel reversed course on the use of heavy munitions in civilian populated areas as a result of the legal and political fallout following the targeted killing of Hamas leader, Salah Shehadeh, see Gabriella Blum & Philip Heymann, *Law and Policy of Targeted Killing*, 1 HARV. NAT’L SEC. J. 145, 152–54 (2010).

One true alternative to drones is manned aircraft. Several commentators have argued that drones would do a better job than manned aircraft, especially when it comes to civilian casualty prevention.⁵⁶ When we look at the numbers, however, they simply do not demonstrate that drones are better at casualty prevention than other aircraft. In fact, at least one of the U.S. military's own studies shows that drones have killed more civilians than manned aircraft in Afghanistan.⁵⁷ Civilian casualty rates from drones are not even demonstrably better than those from the manned aircraft used by NATO in Kosovo, a campaign that was criticized for its high rate of civilian casualties.⁵⁸

Although exact numbers of combatant and civilian casualties, both in Kosovo and more recently with drones, are not readily available, we can compare the range of available statistics. In Kosovo, the civilian to combatant kill ratio ranges from 1:2, at worst, to 1:25, at best.⁵⁹ Ratios of civilian to enemy military deaths by drones in Pakistan from 2004–2011 are nearly within the same range with estimates ranging from 1:4 to 1:25.⁶⁰ The fact that drones have not been demonstrably more successful at sparing civilians than the Kosovo campaign is all the more striking when we recall that NATO was committed to a “zero casualty policy” of riskless warfare. In order to avoid casualties to its own airmen, NATO established a 15,000-foot altitude floor for all bombing sorties.⁶¹ The 15,000-foot floor ensured that NATO bombers were out of reach for Yugoslav army anti-aircraft artillery. The altitude restriction, while designed to ensure the safety of NATO airmen and planes, did “significantly impede[] pilot ability to verify their targets.”⁶² The fact that civilian casualty rates from drones fall into the

⁵⁶ See, e.g., Beauchamp & Savulescu, *supra* note 44.

⁵⁷ See Spencer Ackerman, *US drone strikes more deadly to Afghan civilians than manned aircraft – adviser*, THE GUARDIAN (July 2, 2013), <http://www.theguardian.com/world/2013/jul/02/us-drone-strikes-afghan-civilians>.

⁵⁸ Steven Erlanger, *Rights Group Says NATO Bombing in Yugoslavia Violated Law*, N.Y. TIMES (June 8, 2000), <http://www.nytimes.com/2000/06/08/world/rights-group-says-nato-bombing-in-yugoslavia-violated-law.html>.

⁵⁹ Estimates of the ratio of civilian to enemy military deaths in the Kosovo campaign range from 1:2 to 1:25, with actual number estimates ranging from 20 to 1,200 civilians killed and 1,000 to 18,000 combatants killed. Ratios of civilian to enemy military deaths by drones in Pakistan from 2004–2011 are nearly within the same range with estimates ranging from 1:4 to 1:25. See HUMAN RIGHTS WATCH, *supra* note 7; see also Steven Lee Myers, *Crisis in the Balkans: The Toll; Damage to Serb Military Less Than Expected*, N.Y. TIMES (June 28, 1999), <http://www.nytimes.com/1999/06/28/world/crisis-in-the-balkans-the-toll-damage-to-serb-military-less-than-expected.html>.

⁶⁰ See Avery Plaw, *Counting the Dead: The Proportionality of Predation in Pakistan*, in KILLING BY REMOTE CONTROL 126, 138–39 (Bradley J. Strawser ed., 2013).

⁶¹ See Int'l Crim. Tribunal for the Former Yugoslavia, Final Report to the Prosecutor by the Committee Established to Review the NATO Bombing Campaign Against the Federal Republic of Yugoslavia, ¶2, <http://www.icty.org/x/file/Press/nato061300.pdf> [hereinafter NATO Bombing Report].

⁶² See Beauchamp & Savulescu, *supra* note 44, at 113. Cf. NATO Bombing Report, *supra* note 62, at ¶56 (concluding that “there is nothing inherently unlawful about flying above the height which can be reached by enemy air defences [sic]”).

same range as even manned attacks in which target verification was impeded strongly calls into question the assumption that drones spare more civilian lives.⁶³

Drones' lack of success at sparing civilians should not be surprising given that drones are used to target terrorists in civilian populated areas. What is surprising is that many commentators have failed to draw the obvious inference from drone use in civilian areas to more civilian casualties. Some have even pointed to the recent Libya intervention where drones were used to "hit targets that are close to civilians or inside dense urban areas."⁶⁴ From the fact that drones were used in "dense urban areas," they infer that drones "are well suited both for distinguishing between enemies and civilians and engaging ground troops in ways that might risk the lives of pilots in manned aircraft."⁶⁵ There are at least two undefended and implausible assumptions at work in the leaps to these conclusions.

First, the fact that drones were used in dense urban areas does not, by itself, show that they are better at distinguishing enemies from civilians. Both the facts of the Libyan context and the nature of aerial assaults belie the claim. For example, when Qaddafi's forces were targeted by conventional aircraft, they quickly abandoned the battlefield to hide among the civilian population.⁶⁶ Drones were then used to target Qaddafi's forces among civilians.⁶⁷ Drones were used, however, not because they were able to pick out only Qaddafi's forces, as if they were a kind of science fiction sniper rifle from the sky. Drones were used because the more destructive munitions from manned aircraft were deemed a legal and political non-starter. Civilians were thus killed alongside combatants who would not have been killed without drones. I am willing to assume, for the sake of discussion, that the civilian deaths were proportionate and therefore justified. However, it would be misleading to present drones as if they were able to cleanly discriminate between the enemy and civilians and thereby impose no additional death on civilians.

Second, the argument that drones are well suited to engage "ground troops in ways that might risk the lives of pilots in manned aircraft" assumes that militaries using drones will take more risks with them than with manned aircraft. However, the facts do not bear out this assumption either. No Predator or Reaper drones were lost in Libya.⁶⁸ By comparison, at least two manned fighter jets were shot down during the NATO bombing campaign in Kosovo.⁶⁹ Since drones are far

⁶³ See, e.g., Anderson, *supra* note 30.

⁶⁴ Beauchamp & Savulescu, *supra* note 44, at 120.

⁶⁵ *Id.* at 119–20.

⁶⁶ See Anderson, *supra* note 30, at 385.

⁶⁷ See *id.*

⁶⁸ The only drone that was reportedly lost was a Navy helicopter surveillance drone. See David Axe, *Drone Copter is NATO's First Combat Casualty in Libya*, WIRED (June 21, 2011), <https://www.wired.com/2011/06/drone-copter-is-natos-first-combat-casualty-in-libya/>.

⁶⁹ See DEP'T OF DEFENSE, REPORT TO CONGRESS: KOSOVO/OPERATION ALLIED FORCE AFTER-ACTION REPORT, xxiii (Jan. 31, 2000), <http://www.dod.gov/pubs/kaar02072000.pdf>.

more susceptible to enemy fire than the manned fighter jets used in Kosovo, if the U.S. military really were taking additional risks with drones, then we should expect far more shoot-downs of drones. As noted earlier, however, drones are generally only flown in “permissive” airspace.

When we look more closely at the facts of drone use and compare them to manned aircraft, we find that drones are not even a promising replacement for manned aircraft in humanitarian interventions. If we return again to NATO’s campaign in Kosovo, one of the strongest arguments among drone defenders is that by increasing troop protection, drones would make states more likely to conduct humanitarian interventions, while also enabling better protection of civilians.⁷⁰ However, these claims rest on misapprehensions of drone technology and capabilities. The Predator or Reaper drones that offer the most accuracy and lowest impact targeting could not have carried out the Kosovo bombing campaign at all given their limited fire power and increased vulnerability to enemy air defenses. While unmanned versions of the aircraft that actually carried out the Kosovo bombing campaign could be remotely piloted in a similar mission today, the accuracy and lower impact advantages of Predators and Reapers would be forfeited. Moreover, there is no expectation that unmanned F-16s and F/A-18 Hornets would be any less vulnerable to enemy air defenses than manned versions. We might expect a marginal increase in acceptable risk with unmanned aircraft, but at more than \$60 million per aircraft, we should expect that the military will continue to avoid flying them where it anticipates a significant likelihood of loss.

The difference provided by drones is neither risklessness nor fewer civilian casualties. Rather, the difference is that Predator and Reaper drones have changed the alternative space of using lethal military force in civilian populated areas. Drones have put lethal force on the table in areas where aerial strikes with other weapons would be rejected altogether. Drones have thus made aerial assaults in civilian populated areas a policy norm for the first time since World War II. The expansion of aerial strikes in civilian areas requires a reexamination of the law governing the use of lethal military force.

II. Determining the Right Legal Framework

*I don’t think anyone has worked out . . . what to do when soldiers and civilians are indistinguishable and the enemy exploits that fact.*⁷¹

⁷⁰ See Beauchamp & Savulescu, *supra* note 44, at 119–20 (“[Drones] are well suited both for distinguishing between enemies and civilians and engaging ground troops in ways that might risk the lives of pilots in manned aircraft. These are precisely the two tactical roles in which manned aircraft were ineffectively (from the standpoint of civilian protection) deployed in Kosovo and other interventions.”).

⁷¹ Anonymous U.S. Army colonel and military ethicist at West Point, *cited in* David Luban, *Risk Taking and Force Protection*, Georgetown Public Law and Legal Theory Research Paper No. 11-72, 19 (2011).

The innovation of drone strikes in civilian populated areas away from active hostilities requires us not only to rethink the specific rules governing the use of lethal force, but also to determine what legal framework properly governs the use of lethal force with drones. As suggested by the Obama Administration's Presidential Policy Guidance (PPG), drone strikes away from active hostilities do not fit cleanly within either the law of armed conflict (LOAC) or the law enforcement paradigm. Although the above discussion has presumed a LOAC framework, many believe that a law enforcement framework should govern lethal military force away from active hostilities.⁷² Others have argued that a mixed law enforcement and LOAC framework properly applies.⁷³ The United States, for its part, has insisted that its use of drones away from active hostilities is governed by the LOAC.⁷⁴ More specifically, the official position of the U.S. is that it is in a non-international armed conflict (NIAC) with al-Qaeda, the Taliban, and associated forces.⁷⁵ Despite the official U.S. position, the redacted PPG made public by the Obama administration appears to draw some law enforcement principles into its rules for strikes outside combat areas. Though the PPG is non-binding policy, it suggests that the Obama administration recognized the unique risks in using drones away from active hostilities.

The main problem with the approach taken by the Obama Administration, however, is that neither the law enforcement nor the LOAC framework is an adequate basis for regulating drones. A law enforcement framework is simply not compatible with the standing shoot-to-kill orders typical of drone strikes. While a LOAC framework is thus required by default, the LOAC was not developed for the use of lethal military force in areas away from active combat. As a result, distinction and proportionality need to be reformulated specifically for the use of force outside active combat areas. In addition to filling a lacuna in the law governing lethal military force, articulating and affirming the legal obligations that govern the use of force in non-combat areas is also a superior alternative to mere policy guidance that may not only be suspended by the current U.S.

⁷² See, e.g., Kevin Jon Heller, *Judge Bates's Infernal Machine*, 159 U. PA. L.REV. 175, 183 (2011) ("International humanitarian law thus does not govern [targeted killing away from active hostilities] . . . the international human rights law standard applies.").

⁷³ See Blum & Heymann, *supra* note 55, at 164 ("[T]he legitimate contours of the use of targeted killing . . . fit both a more constrained war paradigm and a more lax law enforcement paradigm . . .").

⁷⁴ See, e.g., John O. Brennan, Assistant to the President for Homeland Security & Counterterrorism, The Ethics and Efficacy of the President's Counterterrorism Strategy, Remarks at the Woodrow Wilson Int'l Ctr. for Scholars, Washington, D.C. (Apr. 30, 2012); Harold Hongju Koh, Legal Adviser of the U.S. Dep't of State, The Obama Administration and International Law, Remarks at Annual Meeting of the Am. Soc'y of Int'l Law, Washington, D.C. (Mar. 25, 2010).

⁷⁵ There is some suggestion that, despite the Supreme Court's ruling in *Hamdan v. Rumsfeld*, 548 U.S. 557 (2006), which found that the U.S. was in a NIAC with al-Qaeda, *see id.* at 631, the Obama Administration applied the law governing international armed conflicts (IAC) to its conflict with al-Qaeda, the Taliban, and associated forces. See John Bellinger, *Obama's Announcements on International Law*, LAWFARE (Mar. 8, 2011), <https://www.lawfareblog.com/obamas-announcements-international-law>.

administration, but rejected by other nations altogether.⁷⁶ Articulating and affirming appropriate legal obligations for the unique context of drone strikes away from active hostilities would enable the U.S. to take the lead in constructing the legal architecture to regulate drones for the future, something that cannot be achieved by policy guidance alone. An examination of the requirements imposed by the PPG will demonstrate why the LOAC needs to be reformulated for drone strikes outside active combat areas.

The PPG sets out one general and five specific requirements for the use of lethal force outside areas of active hostilities. The general requirement holds that

the United States will use lethal force only against a target that poses a continuing, imminent threat to U.S. persons. It is simply not the case that all terrorists pose a continuing, imminent threat to U.S. persons; if a terrorist does not pose such a threat, the United States will not use lethal force.⁷⁷

The strained notion of a “continuing, imminent threat” is the government’s attempt to cover the two justifications that the U.S. has for using force against terrorist threats (the *jus ad bellum* question).⁷⁸ The first justification tracks the positions that the U.S. is in a NIAC with the terrorists it targets. In a NIAC, the non-state actor enemy is targetable based on its conduct, not its status.⁷⁹ The fact that a terrorist poses a continuing threat is sufficient to qualify the terrorist as a legitimate military objective in a NIAC.⁸⁰ The second justification follows from

⁷⁶ See, e.g., Savage & Schmitt, *supra* note 5.

⁷⁷ Fact Sheet, *supra* note 4.

⁷⁸ *Id.*

⁷⁹ See, e.g., Brian J. Egan, Legal Adviser, Remarks on International Law, Legal Diplomacy, and the Counter-ISIL Campaign at the American Society of International Law [hereinafter *Remarks on International Law*], Washington, D.C. (Apr. 1, 2016), <https://2009-2017.state.gov/s/l/releases/remarks/255493.htm> (“In many cases we are dealing with an enemy who does not wear uniforms or otherwise seek to distinguish itself from the civilian population. In these circumstances, we look to all available real-time and historical information to determine whether a potential target would be a lawful object of attack.”). See also NILS MELZER, INTERPRETIVE GUIDANCE ON THE NOTION OF DIRECT PARTICIPATION IN HOSTILITIES UNDER INTERNATIONAL HUMANITARIAN LAW 33 (2009) (“[I]n IHL [International Humanitarian Law] governing non-international armed conflict, . . . the decisive criterion for individual membership in an organized armed group is whether a person assumes a continuous function for the group involving his or her direct participation in hostilities.”).

⁸⁰ See, e.g., MELZER, *supra* note 79, at 34 (“[I]ndividuals whose continuous function involves the preparation, execution, or command of acts or operations amounting to direct participation in hostilities are assuming a continuous combat function.”). Although enemy combatants in a NIAC should be identified based on their conduct or “continuous combat function,” *id.*, the D.C. Circuit has, in a number of cases, applied a membership test without regard to actual conduct or combat function. See, e.g., *Al-Bihani v. Obama*, 590 F.3d 866, 873 n.2 (D.C. Cir. 2010) (“Al-Bihani attended Al Qaeda training camps in Afghanistan and visited Al Qaeda guesthouses. . . . [E]vidence . . . of either of those two facts . . . would seem to overwhelmingly, if not definitively, justify the government’s detention of such a non-citizen.”). A membership test based on circumstantial association, rather than combat conduct, is more appropriate for the regular armed forces of states engaged in an international armed conflict rather than a NIAC. See, e.g., Jennifer

the inherent right of self-defense before an imminent threat enshrined in Article 51 of the UN Charter.⁸¹ The U.S. would be able to exercise its right of self-defense against a target posing an imminent threat even if the U.S. were not otherwise in an armed conflict with the group to which the terrorist belongs. Because the U.S. assessment of both a “continuing” and an “imminent” threat that would justify a military response is significantly more elastic than the “immediate” threat required in a law enforcement context, the general condition on use of lethal force set out by the PPG falls squarely within the LOAC framework.

In addition to the general requirement, the PPG sets out five specific criteria that “must be met” before lethal force may be used:

- 1) Near certainty that the terrorist target is present;
- 2) Near certainty that non-combatants will not be injured or killed;
- 3) An assessment that capture is not feasible at the time of the operation;
- 4) An assessment that the relevant governmental authorities in the country where action is contemplated cannot or will not effectively address the threat to U.S. persons; and

Daskal, *The Geography of the Battlefield: A Framework for Detention and Targeting Outside the “Hot” Conflict Zone*, 161 U. PA. L. REV. 1165, 1178 (2013) (“Critically, this detention authority rests on an individual’s status as a member of (‘part of’) the enemy forces and is based on an analogy to the rules of international armed conflict. Under these rules, such status makes the individual a legitimate military target as well, assuming the person has not attempted surrender or is *hors de combat* (i.e., a sick, wounded, or detained fighter).”). See also MELZER, *supra* note 80, at 25 (“For the regular armed forces of States, individual membership is generally regulated by domestic law and expressed through formal integration into permanent units distinguishable by uniforms, insignia, and equipment.”). For an insightful critique of the D.C. Circuit’s reliance on circumstantial associational criteria like stays at a guesthouse, see Benjamin Wittes, *The Significance of Guesthouses and Training*, LAWFARE (June 11, 2011), www.lawfareblog.com/significance-guesthouses-and-training (“[A] guesthouse stay . . . does not even . . . create a presumption of membership, and it should not shift the burden of persuasion to the detainee. The court, rather, should treat it only as one probative indicator of a relationship between an individual and a group . . .”).

⁸¹ See UN Charter art. 51. See Koh, *supra* note 74 (“[T]he United States is in an armed conflict with al-Qaeda, as well as the Taliban and associated forces, in response to the horrific 9/11 attacks, and may use force consistent with its inherent right to self-defense under international law.”). What properly qualifies as an “imminent” threat has been a matter of some controversy, at least since the “Bush doctrine” defending preemptive or preventive war. There is general agreement that the temporal scope of an “imminent” threat is somewhat more elastic than the “immediate” threat that would justify lethal force in a law enforcement context. The elasticity of the current understanding of imminence is in tension with the classic formulation of the imminence standard given by Secretary of State Daniel Webster during the famous *Caroline* incident. There, Webster argued that military self-defense should “be confined to cases in which the necessity of that self-defense is instant, overwhelming, and leaving no choice of means, and no moment for deliberation.” James Bassett Moore, *Destruction of the “Caroline,”* 2 DIG. INT’L L. 409, 412 (1906).

- 5) An assessment that no other reasonable alternatives exist to effectively address the threat to U.S. persons.⁸²

Interestingly, only the fourth criterion has a clear source in the LOAC.⁸³ Each of the other criteria more clearly derives from law enforcement considerations. Under the Fourth Amendment, police may use lethal force only against a suspect who poses an immediate threat of serious physical harm to the officer or others.⁸⁴ Where the possibility of harming innocent bystanders exists, the law enforcement framework imposes additional restrictions on the use of force. New York City, for instance, imposes the following restrictions on police use of lethal force:

- a. Police officers shall not use deadly physical force against another person unless they have probable cause to believe that they must protect themselves or another person present from imminent death or serious physical injury.
- b. Police officers shall not discharge their weapons when doing so will unnecessarily endanger innocent persons.⁸⁵

Violations of the prohibition against unnecessarily endangering innocent persons have been found when police officers “discharge their weapons when an innocent person was in close proximity to the suspect,” for example, when an innocent person “was held as a human shield in the line of fire,” and a police officer nevertheless fired at the suspect, killing the human shield.⁸⁶ New York courts also found that an officer firing at a suspect “into a crowd was outside the realm of acceptable police practice.”⁸⁷ These law enforcement strictures appear to form the basis of the second, third, and fifth requirements that the PPG imposes. Drone operators should avoid imposing unnecessary risk on civilians and should seek alternatives to the use of lethal force if such force will put civilians in harm’s way. The first criterion, near certainty that the terrorist target is present, can also be

⁸² Fact Sheet, *supra* note 4. A sixth criterion, apparently related to target approval procedures among Department and Agency deputies, is redacted. *See* Procedures for Approving Direct Action Against Terrorist Targets, *supra* note 4, at 3.

⁸³ For a comprehensive discussion of the LOAC foundation of the “unwilling or unable” test, *see* Ashley S. Deeks, “Unwilling or Unable”: Toward a Normative Framework for Extraterritorial Self-Defense, 52 VIR. J. INT’L L. 483 (2012).

⁸⁴ *Tennessee v. Garner*, 471 U.S. 1, 11 (1985) (“Where the suspect poses no immediate threat to the officer and no threat to others, the harm resulting from failing to apprehend him does not justify the use of deadly force to do so. . . . Where the officer has probable cause to believe that the suspect poses a threat of serious physical harm, either to the officer or to others, it is not constitutionally unreasonable to prevent escape by using deadly force.”). *See also* *Scott v. Harris*, 550 U.S. 372, 386 (2007) (“The car chase that respondent initiated in this case posed a substantial and immediate risk of serious physical injury to others Scott’s attempt to terminate the chase by forcing respondent off the road was reasonable, and Scott is entitled to summary judgment.”)

⁸⁵ *Johnson v. City of New York*, 942 N.E. 2d 219, 221–22 (N.Y. 2010), quoting New York City Police Department Procedure No. 203–12, “Deadly Physical Force.”

⁸⁶ *Lubecki v. City of New York*, 758 N.Y.S. 2d 610, 618 (N.Y. App. Div. 1st Dept. 2003).

⁸⁷ *Rodriguez v. City of New York*, 595 N.Y.S. 2d 421, 429 (N.Y. App. Div. 1st Dept. 1993), quoting *Velez v. City of New York*, 556 N.Y.S.2d 537 (N.Y. App. Div. 1st Dept. 1990).

interpreted as related to the protection of civilians. It bars strikes where there is a reasonable question of whether the intended target is present and thus whether civilians, rather than the target, will be killed.⁸⁸ The PPG thus presents a LOAC framework modified by law enforcement considerations for drone strikes outside areas of active hostilities.

There are several reasons why the modified LOAC framework established by the PPG is warranted.⁸⁹ As the Ninth Circuit succinctly stated in *Idaho v. Horichi*, standing shoot-to-kill orders are “wartime rules . . . patently unconstitutional for a police action.”⁹⁰ Although LOAC requirements can always be modified by more restrictive rules of engagement, law enforcement rules cannot accommodate the standing shoot-to-kill orders operative in drone strikes. Moreover, drone strikes away from active hostilities will almost never involve an “immediate threat to U.S. persons” of the kind required to warrant lethal force in a law enforcement operation.⁹¹ The use of lethal force in the absence of an immediate threat, and in contexts where civilian casualties are anticipated, would always be out of bounds in a law enforcement context. Thus drone strikes could only be carried out under a LOAC framework. However, if the Obama Administration was correct in restricting the use of military force outside active war zones, then the LOAC as it currently stands is also inadequate to govern drone strikes. An examination of the legal baselines established by the LOAC will show why it must be reformulated to properly regulate the unique uses of lethal force made possible by drone technology.

III. The Law of Armed Conflict Baseline

A close review of the LOAC shows that it is poorly suited to drone strikes in areas away from active hostilities. The core LOAC principles of distinction and proportionality presume that armed forces can readily distinguish between combatants and civilians. They also presume that military objectives and civilian

⁸⁸ There have been several reported cases of civilian casualties in drone strikes where the intended target was not present. Perhaps the most well known is the killing of sixteen year old Abdulrahman al-Aulaqi, an American citizen killed at an outdoor café in Yemen on the basis of bad intelligence. The intended target, an Egyptian al-Qaeda operative, was not present. The attack killed twelve civilians, including two minors. See Mazzetti et al., *supra* note 36.

⁸⁹ Israel has also opted for a modified LOAC framework for targeted killing. See Blum & Heymann, *supra* note 55, at 159 (“[T]he Israeli Supreme Court sought a middle ground between a more aggressive law enforcement paradigm and a tamer wartime paradigm. It chose the latter as its point of departure, but then, in consideration of the unique nature of the war on terrorism, added limitations and constraints on the government’s war powers so as to remain as loyal as possible to the basic principles and values of the Israeli legal system.”).

⁹⁰ *Idaho v. Horiuchi*, 253 F. 3d 359, 377 (9th Cir. 2001), *vacated as moot*, 266 F. 3d 979 (9th Cir. 2001).

⁹¹ That is to say, the situation depicted in *Eye in the Sky*, where drone operators happen upon a group of terrorists who will carry out an attack on civilians if they are not stopped immediately, is the stuff of good thriller fiction, not reality. Cf. Daskal, *supra* note 80, at 1219 (“[C]ontrary to oft-repeated rhetoric about the ticking time bomb, few, if any, capture or kill operations outside a zone of active conflict occur in situations of true exigency.”).

objects are generally distinct rather than thoroughly intermingled. As for the rules themselves, there is a conflict between the black letter law and doctrine of distinction, which would seem to bar drone strikes in civilian populated areas, and a growing state practice of such targeting. Proportionality, as it is generally understood, does not take into account the most important mid- and long-term effects of drone strikes to arrive at an accurate assessment of the true military advantage of a strike. Finally, precaution in attack, which calls on armed forces to warn civilians before an impending attack “if feasible,” will always go unheeded in drone strike situations where surprise is essential. Although these basic LOAC principles are generally well suited to regulating the use of force in areas of active hostilities, the baseline they set for armed conflict generally is simply not adequate to the reality of drone strikes.

Before examining the core rules constituting the LOAC, it is worth noting that the question of how to distinguish between combat and non-combat areas has been at the center of the U.S. military’s approach to drone strikes. As former State Department Legal Adviser, Brian Egan, stated:

The phrase “areas of active hostilities” is not a legal term of art—it is a term specific to the PPG. For the purpose of the PPG, the determination that a region is an “area of active hostilities” takes into account, among other things, the scope and intensity of the fighting. The Administration currently considers Afghanistan, Iraq, and Syria to be “areas of active hostilities,” which means that the PPG does not apply to operations in those States.⁹²

Although Egan is correct in stating that “areas of active hostilities” is not a standard legal term in the LOAC, the “scope and intensity of the fighting” that Egan references have been the central criteria for determining the existence of hostilities and distinguishing areas of active combat from non-combat areas.⁹³ The zone of combat or active hostilities to which the LOAC applies is typically taken to encompass a territorial jurisdiction, such as an entire nation-state in international conflicts,⁹⁴ or the territory held by a party to a non-international

⁹² Brian Egan, Remarks on International Law, *supra* note 79. In response to questions by New York Times reporter Charlie Savage, Egan further indicated that active hostilities extended across the border of Afghanistan into the Federally Administered Tribal Areas (FATA) of Pakistan, where most CIA drone strikes have taken place. *Id.*

⁹³ For instance, the International Criminal Tribunal for the Former Yugoslavia found that “protracted armed violence between government authorities and organized armed groups” are the central criteria of the existence of a non-international armed conflict. Prosecutor v. Tadić, Case No. IT-94-I-I, Decision on the Defence Motion for Interlocutory Appeal on Jurisdiction, ¶ 70 (Int’l Crim. Trib. for the Former Yugoslavia Oct. 2, 1995) [hereinafter Tadić decision]. *See also* Reservation by the United Kingdom to Additional Protocol I, Art. 1(4) and Art. 96(3) (“‘[A]rmed conflict’ of itself and in its context denotes a situation of a kind which is not constituted by the commission of ordinary crimes including acts of terrorism whether concerted or in isolation.”).

⁹⁴ Tadić decision, ¶ 68 (“Although the Geneva Conventions are silent as to the geographical scope of international ‘armed conflicts,’ the provisions suggest that at least some of the provisions of the Conventions apply to the entire territory of the Parties to the conflict, not just to the vicinity of

armed conflict.⁹⁵ However, for conflicts involving non-state actors who do not control territory, such as al-Qaeda, a different approach is needed. The functional criteria for the existence of a NIAC established by international courts—namely, “protracted armed violence between government authorities and organized armed groups”⁹⁶—are the best criteria for distinguishing combat and non-combat areas.⁹⁷ This Article, therefore, uses “active hostilities,” “combat areas,” and similar terms to refer only to areas where there have been actual protracted exchanges of fire.⁹⁸ Determining where to set the boundary of active hostilities should not require more information than sophisticated militaries already possess. Those familiar with conflicts know that sometimes conflict is spread nearly throughout entire regions, while at other times it can be confined to single neighborhoods, or even particular streets. Areas where frequent exchanges of fire are taking place, or have taken place in the recent past, are areas of active combat. Areas where there is no exchange of fire, and no recent protracted exchange of fire, are outside active combat. A review of the core principles of the LOAC will show why distinction and proportionality need to be reformulated for drone strikes outside areas of active combat.

The fundamental rules constituting the LOAC are necessity, distinction, proportionality, and humanity. An additional rule, precaution in attack, is now

actual hostilities. Certainly, some of the provisions are clearly bound up with the hostilities and the geographical scope of those provisions should be so limited. . . . Geneva Convention IV protects civilians anywhere in the territory of the Parties.”).

⁹⁵ Tadić decision, ¶ 70 (the law of armed conflict applies, “in the case of internal conflicts [i.e. non-international armed conflicts], [to] the whole territory under the control of a party”).

⁹⁶ *Id.* at ¶ 70. See also Prosecutor v. Akayesu, ICTR-96-4-T, Judgment, ¶ 619 (Int’l Crim. Trib. for Rwanda Sept. 2, 1998); Rome Statute of the International Criminal Court, art. 8(2)(f), July 17, 1998, 2187 U.N.T.S. 90.

⁹⁷ My emphasis on actual exchanges of fire avoids the finding of a zone of active combat where, for example, one side bombards a defenseless enemy. It also prevents one side from unilaterally creating a zone of active combat simply by choosing to engage in such bombardment. *Cf.* Laurie Blank, *Defining the Battlefield in Contemporary Conflict and Counterterrorism: Understanding the Parameters of the Zone of Combat*, 39 GA. J. INT’L & COMP. L. 1, 37 (2010) (“Areas where the state uses military force, particularly multiple facets of military power, on a regular or recurring basis, should fall within the zone of combat. In contrast, those areas where the state chooses diplomatic or law enforcement measures, or relies on such efforts by another state, do not demonstrate the characteristics of the battlefield.”).

⁹⁸ See, e.g., Hamdi v. Rumsfeld, 542 U.S. 507, 527 (2004) (“An assertion that one resided in a country in which combat operations are taking place is not a concession that one was ‘captured in a zone of active combat’ operations in a foreign theater of war.”). For a thorough review of the distinction between combat and non-combat areas in U.S. case law, international treaties, and international jurisprudence, see Daskal, *supra* note 80, at 1193–1208. My approach to the distinction between combat and non-combat areas differs from Daskal’s in two important respects. First, I do not extend the area of active combat to the entire “administrative area” in which fighting is located, but rather confine it simply to those areas where there has actually been frequent and protracted exchanges of fire. *Cf. id.* at 1208 (“If . . . hostilities are concentrated . . . in certain regions within a state, then the zone will be geographically limited to those administrative areas or provinces in which there is actual fighting.”). Second, I argue for the application of a more restrictive LOAC framework in areas outside of active hostilities, rather than imposing “procedural and substantive standards” outside of the LOAC altogether. *Cf. id.* at 1192.

also generally accepted as customary international law for both international and non-international armed conflicts.⁹⁹ Necessity requires action in armed conflict to be aimed at weakening the military capacity of the enemy.¹⁰⁰ Humanity prohibits action in war that would cause unnecessary suffering, such as the “infliction of suffering for the sake of suffering or for revenge.”¹⁰¹ While necessity and humanity do not raise challenging legal issues, distinction, proportionality, and precaution in attack each warrant more extended discussion, particularly in the context of drone strikes away from active hostilities.

A. Distinction

The rule of distinction holds that “[p]arties to the conflict shall at all times distinguish between the civilian population and combatants and between civilian objects and military objectives and accordingly shall direct their operations only against military objectives.”¹⁰² Military objectives include enemy combatants, civilians directly participating in hostilities, and “objects which by their nature, location, purpose or use make an effective contribution to military action and whose total or partial destruction, capture or neutralization, in the circumstances ruling at the time, offers a definite military advantage.”¹⁰³ Among the most common military objectives are enemy combatants and weapons installations and depots.

The requirement of directing operations only against military objectives is significantly more permissive than it may initially appear. Unlike the law enforcement context, where police are barred from subjecting innocent persons to foreseeable unnecessary risk, distinction only requires attacking forces to intend to strike a military objective, even when they foresee that civilians will be harmed. The central restriction on foreseeable civilian harm comes not from

⁹⁹ While the U.S. has recognized the legal obligation of precaution in attack in both international and non-international armed conflicts, it is not clear whether it recognizes the legal obligation in actions taken in self-defense. State Department Legal Adviser, Brian Egan, explicitly affirmed that “the United States regards as customary international law applicable to all parties in a NIAC” that “[f]easible precautions must be taken in conducting an attack to reduce the risk of harm to civilians, such as, in certain circumstances, warnings to civilians before bombardments.” Brian Egan, Remarks on International Law, *supra* note 79. The ICRC also lists precaution in attack as customary international law applicable to NIACs. See Int’l Comm. of the Red Cross, CUSTOMARY IHL, *Rule 15: Precautions in Attack*, https://ihl-databases.icrc.org/customary-ihl/eng/docs/v1_rul_rule15 (2005).

¹⁰⁰ See ICRC, Military Necessity, <https://casebook.icrc.org/casebook/doc/glossary/military-necessity-glossary.htm>. Cf. DEP’T OF DEFENSE, LAW OF WAR MANUAL § 2.2 [hereinafter DoD LOW Manual] (“Military necessity may be defined as the principle that justifies the use of all measures needed to defeat the enemy as quickly and efficiently as possible that are not prohibited by the law of war.”).

¹⁰¹ Francis Lieber, General Order No. 100, the Instructions for the Government of Armies of the United States in the Field, Article 16 (1863). See also DoD LOW Manual § 2.3 (“Humanity may be defined as the principle that forbids the infliction of suffering, injury, or destruction unnecessary to accomplish a legitimate military purpose.”).

¹⁰² Additional Protocol I, *supra* note 3, at art. 48.

¹⁰³ *Id.* at art. 52(2).

distinction but from proportionality, which requires that anticipated civilian harm not be excessive in relation to the concrete and direct military advantage anticipated from the attack. Thus, at the diplomatic conference where the principle of distinction was codified, the U.S. stated that distinction “prohibits only such attacks as may be directed against non-military objectives. It does not deal with the question of collateral damage caused by attacks directed against military objectives.”¹⁰⁴ Many other states, including close allies such as the U.K. and Israel, have made it clear that distinction prohibits only the intentional or deliberate targeting of civilians, not the targeting of military objectives where harm to civilian is foreseeable or known.¹⁰⁵

In addition to permitting foreseeable harm to civilians, distinction has more recently been interpreted to allow targeting of enemy combatants “wherever and whoever they are,”¹⁰⁶ “whether on the battlefield or outside of it,”¹⁰⁷ and “at all times.”¹⁰⁸ The recently released U.S. Department of Defense Law of War Manual appears to confirm the view that enemy combatants are targetable at all places and times by declaring that “objects that contain military objectives are military objectives.”¹⁰⁹ The Manual specifically defines combatants and civilians taking a direct part in hostilities as “persons who are military objectives.”¹¹⁰ It also cites the Canadian Law of Armed Conflict Manual for the proposition that “[c]ivilian vessels, aircraft, vehicles and buildings are military objectives if they contain combatants, military equipment or supplies.”¹¹¹ These capacious readings of the geographical and temporal limits of targeting imply that a single enemy combatant remains a valid target even when he or she is among a civilian

¹⁰⁴ UNITED STATES, STATEMENT AT THE CDDH, OFFICIAL RECORDS, VOL. VI, CDDH/SR.41, at 204 (May 26, 1977). *See also* similar statements by Australia, Canada, Germany, Italy, the Netherlands, New Zealand, and the U.K. *See* https://ihl-databases.icrc.org/customary-ihl/eng/docs/v2_rul_rule1_sectionb.

¹⁰⁵ ISRAEL, MINISTRY OF FOREIGN AFFAIRS, THE OPERATION IN GAZA 27 DECEMBER 2008—18 JANUARY 2009: FACTUAL AND LEGAL ASPECTS ¶ 97 (July 29, 2009) (“[The Principle of Distinction] addresses only deliberate targeting of civilians, not incidental harm to civilians in the course of striking at legitimate military objectives.”).

¹⁰⁶ UNITED KINGDOM, HOUSE OF LORDS, STATEMENT BY THE PARLIAMENTARY UNDER-SECRETARY OF STATE FOR DEFENCE, *Hansard*, Vol. 653, Debates, col. 600 (Oct. 13, 2003).

¹⁰⁷ ISRAEL, LAWS OF WAR IN THE BATTLEFIELD, MANUAL, MILITARY ADVOCATE GENERAL HEADQUARTERS, MILITARY SCHOOL 42 (1998).

¹⁰⁸ Germany, Lower House of Federal Parliament (*Bundestag*), Reply by the Federal Government to the Minor Interpellation by Members Jerzy Montag, Hans-Christian Ströbele, Omit Nouripour, further Members and the Parliamentary Group BÜNDIS 90/DIE GRÜNEN, *BT-Drs.* 17/3916, Nov. 23, 2010, at 6 (“[M]embers of the opposing armed forces (combatants) in international armed conflict and, in non-international armed conflict, members of organized armed groups exercising a continuous combat function may be lawfully targeted at all times as enemy fighters under international humanitarian law, including with the use of lethal force.”).

¹⁰⁹ DoD LOW Manual, *supra* note 100, at 5.7.4.2.

¹¹⁰ *Id.* at 5.7.2.

¹¹¹ *Id.* at 5.7.4.2, n.149 (citing Canada, Department of National Defence, Joint Doctrine Manual B-GJ-005-104/FP-021, Law of Armed Conflict at the Operational and Tactical Levels (Aug. 13, 2001)).

population or in a civilian location, such as a home,¹¹² marketplace,¹¹³ or café.¹¹⁴ These permissive interpretations of distinction are increasingly confirmed by state practice, especially the practice of targeted killing away from active hostilities.¹¹⁵ Although the increased practice of targeted killing with drones would seem to confirm a reading of distinction that permitted aerial assaults on combatants whether on the battlefield or outside of it, the black letter law of armed conflict, legal doctrine, and the development of distinction each call into question the legitimacy of the more recent state practice.

The First Additional Protocol (AP I) to the Geneva Conventions contains the first modern codification of the principle of distinction. There, in its definition of civilians and the civilian population, article 50(3) specifically states that “[t]he presence within the civilian population of individuals who do not come within the definition of civilians does not deprive the population of its civilian character.” Article 51(1) goes on to state that “[t]he civilian population and individual civilians shall enjoy general protection against dangers arising from military operations.” Article 51(2) states “[t]he civilian population as such, as well as individual civilians, shall not be the object of attack.” Taken together, these rules clearly state that a civilian population in which there are a small number of enemy combatants retains its protected status as a civilian population and may not be subject to attack. Following the widely accepted black letter law of armed conflict as articulated in AP I,¹¹⁶ drones strikes against a single enemy combatant or terrorist within a civilian population should be understood to be violation of distinction.

Judicial doctrine confirms the view that “[t]he presence of individual combatants within the population does not change its civilian character.”¹¹⁷ The International Criminal Tribunal for the Former Yugoslavia (ICTY) favorably cites

¹¹² See Blum & Heymann, *supra* note 55, at 152–53 (“On the night of July 22, 2002, an Israeli F-16 aircraft dropped a single one-ton bomb on Shehadeh's house in a residential neighborhood of Gaza City, one of the most densely populated areas on the globe. As a result, Shehadeh and his aide, as well as Shehadeh's wife, three of his children, and eleven other civilians, most of whom were children, were killed. One hundred and fifty people were injured.”).

¹¹³ See, e.g., HUMAN RIGHTS WATCH, *Yemen: US Bombs Used in Deadliest Market Strike* (April 7, 2016), <https://www.hrw.org/news/2016/04/07/yemen-us-bombs-used-deadliest-market-strike> (Saudi Arabia-led coalition airstrikes on a crowded market in the village of Mastaba in northwestern Yemen on March 15, 2016 killed at least 97 civilians, including 25 children. The two strikes are thought to have also killed about 10 Houthi fighters.).

¹¹⁴ See *supra* note 88. See also Mazzetti et al., *supra* note 36.

¹¹⁵ The U.S. and Israel have contributed more than any other countries to the state practice of targeted killing away from active hostilities. See Jonathan Masters, *Targeted Killings*, CFR BACKGROUNDERS (May 23, 2013), <http://www.cfr.org/counterterrorism/targeted-killings/p9627>

¹¹⁶ Additional Protocol I has been ratified by 174 countries. For a list of States Parties to Additional Protocol I, see INT'L COMM. OF THE RED CROSS, *Treaties and States Parties to Such Treaties*, https://www.icrc.org/applic/ihl/ihl.nsf/States.xsp?xp_viewStates=XPages_NORMStatesParties&xp_treatySelected=470.

¹¹⁷ Galić, *supra* note 10, at ¶ 50. See also Prosecutor v. Duško Tadić, Case No. IT-94-I-T, Opinion and Judgment, ¶638 (Int'l Crim. Trib. for the Former Yugoslavia May 7, 1997) (“The presence of certain non-civilians in their midst does not change the character of the population.”).

the International Committee of the Red Cross' (ICRC) Commentary on AP I, article 50(3), which states that:

[i]n wartime condition it is inevitable that individuals belonging to the category of combatants become intermingled with the civilian population, for example, soldiers on leave visiting their families. However, provided that these are not regular units with fairly large numbers, this does not in any way change the civilian character of a population.¹¹⁸

The ICRC Commentary cited by the ICTY suggests that the presumption in favor of protected civilian status can only be broken by the presence of a large number of enemy combatants. The Commentary's example of "soldiers on leave visiting their families" further suggests that the presumption in favor of protected civilian status is even greater in areas away from active hostilities. Nevertheless, some of the best known cases of targeted killing, such as Israel's killing of Salah Shehadeh and the mistaken killing of Abdulrahman al-Aulaqi by the U.S., are precisely cases in which combatants were, or were believed to be,¹¹⁹ intermingled with the civilian population. Insofar as drone strikes away from active hostilities aim at single or small numbers of enemy combatants or terrorists who are otherwise among civilian populations, they run contrary to both the black letter law and doctrine of distinction.

The development of the rule of distinction also supports the conclusion that targeting single individuals in an otherwise civilian context violates the rule. The baseline expectation for distinction is that most military objectives will contain no civilians and that those objects that do contain civilians will be clear military objects. This can be inferred from the generally accepted interpretation of distinction that the presence of individual civilians in clear military objectives, such as warships, munitions factories, or military bases, does not alter the status of the objective as a proper military objective.¹²⁰ Thus the U.S. Navy's Commander's Handbook on the Law of Naval Operations states that "[t]he presence of civilian workers, such as technical representatives aboard a warship or employees in a munitions factory, in or on a military objective, does not alter the status of the military objective."¹²¹ Examples such as these abound in military manuals. They suggest that the development of distinction is predicated on the

¹¹⁸ Galić, *supra* note 10, at ¶ 50, n.91 (citing Int'l Comm. of the Red Cross, Commentary to Protocol Additional to the Geneva Conventions of 12 August 1949, and relating to the Protection of Victims of International Armed Conflicts (Protocol I), 8 June 1977, ¶ 1922 (ed. Sandoz et al. 1987)).

¹¹⁹ See *supra* note 88. See also Mazzetti et al., *supra* note 36.

¹²⁰ But see DoD LOW Manual, *supra* note 100, at 5.7.4.2., note 149.

¹²¹ DEP'T OF THE NAVY, THE COMMANDER'S HANDBOOK ON THE LAW OF NAVAL OPERATIONS § 8.3.2. (2007). For discussion of the Handbook's problematic treatment of proportionality, see Marty Lederman, *Troubling Proportionality and Rule-of-distinction Provisions in the Law of War Manual*, JUST SEC. (June 27, 2016), <https://www.justsecurity.org/31661/law-war-manual-distinction-proportionality/>.

limited anticipated presence of civilians in otherwise clear military objects. This expectation helps explain the limited acceptance of civilian casualties as long as they are not the intended target and are not excessive. Moreover, this reading of distinction is balanced by the rule articulated in Art. 50(3) of AP I, that the presence of individual combatants in a civilian population does not alter the protected status of the civilian population. The assumptions supporting the law of distinction are that, generally, combatants and civilians will be distinct, and that civilians will not be found in military objects, and vice versa. While distinction can accommodate limited exceptions to the baseline assumptions, when civilians and combatants are thoroughly intermingled distinction needs to be rethought to accommodate a different set of background conditions.

An additional reason why permissive interpretations of distinction should be rethought for drone strikes away from active hostilities is that the legal doctrine interpreting distinction appeals to proximity to active hostilities as a factor bearing on the status of the person or object targeted. For instance, the ICTY Appeals Chamber, in its judgment in the *Kordić and Čerkez* case, stated that “members of the armed forces resting in their homes *in the area of the conflict* . . . remain combatants whether or not they are in combat, or for the time being armed.”¹²² Here the proximity to the conflict helps justify the targeting of a soldier while at home. The presence of hostilities in civilian areas alters the status of an otherwise civilian object. Thus the ICRC Commentary states that “[i]f combat is taking place within a city or a town, and there is fighting from house to house, which is frequently the case, it is clear that the situation becomes very different and that any building sheltering combatants becomes a military objective.”¹²³ The presence of general hostilities is a significant, though not decisive, indicator in favor of the military status of a person or object. This is consistent with the principle suggested by the ICRC Commentary and cited by the ICTY in *Galić* that if a soldier were at her home away from the conflict, the home would remain a protected civilian object. Location away from active hostilities thus sets a default presumption in favor of civilian status. While closer analysis of the circumstances ruling at the time of attack are required to determine the actual status of the object in question, the presence or absence of hostilities sets default expectations for combatants and civilians alike.

A final reason why the baseline established by distinction must be rethought for drone strikes away from active hostilities is the fact that civilians who attempt to defend themselves against a drone attack would thereby lose their protected status and themselves become subject to attack. As the ICTY found in the *Galić* case:

The protection from attack afforded to individual civilians by Article 51 of Additional Protocol I is suspended when and for such

¹²² Prosecutor v. Kordić and Čerkez, Case No. IT-95-14/2-A, Judgment, ¶51 (Int’l Crim. Trib. for the Former Yugoslavia Dec. 17, 2004) (emphasis added).

¹²³ Cited in DoD LOW Manual, *supra* note 100, at 5.7.4.2, n.150.

time as they directly participate in hostilities. . . . [I]f a group of civilians takes up arms . . . and engages in fighting against the enemy belligerent, they may be legitimately attacked by the enemy belligerent.”¹²⁴

While the above rule makes a good deal of sense for civilian participation in areas of active hostilities, it is overly restrictive on the right of self-defense away from active hostilities. In active conflict areas, it is reasonable to assume that civilians who take up arms and directly participate in hostilities are doing so not merely for their own individual self-defense, but in order “to support a party to the conflict against another.”¹²⁵ However, in areas where there is no active conflict, taking up arms to defend oneself or one’s family from impending attack looks more like a personal exercise of self-defense or defense of others. In the law enforcement context, where police are barred from unnecessarily endangering innocent persons,¹²⁶ an innocent bystander would be free to resist unlawful force, even from a public official, without losing her protected status.¹²⁷ A civilian who has not been warned of an impending attack and who is not on notice of active hostilities looks much more like the innocent bystander facing unnecessarily endangering force. She has no reason to believe that an incoming attack that will kill her or her family is, in fact, lawful. Yet LOAC only maintains the protected status of civilians for self-defense against attacks that violate LOAC.¹²⁸ The fact that innocent civilians have no right to defend themselves against attacks for which they have received no warning and that take place far from active hostilities, implies that they are due more protection than LOAC normally affords civilians subject to the harms of war. LOAC, which has developed chiefly for areas of active hostilities, needs to be rethought for its application to civilian areas away from active combat.

The black letter law and judicial construction of distinction, the primary purpose of which is to “ensure respect for and protection of the civilian population and civilian objects,”¹²⁹ is geared toward conventional contexts of active hostilities. Targeting individual combatants in areas away from active hostilities, although directed at what would be a legitimate military objective in a conventional context, runs contrary to the purpose of distinction whenever those combatants are found in a predominantly civilian context. The black letter law

¹²⁴ Galić, *supra* note 10, at ¶ 48.

¹²⁵ Melzer, *supra* note 79, at 61.

¹²⁶ *Johnson v. City of New York*, 15 N.Y. 3d 626, 221–22 (N.Y. 2010).

¹²⁷ See, e.g., Model Penal Code §3.04, *Use of Force in Self-Protection* (“[T]he use of force upon or toward another person is justifiable when the actor believes that such force is immediately necessary for the purpose of protecting himself against the use of unlawful force by such other person on the present occasion.”). In the typical self-defense context, only unjust aggressors are barred from using force to defend themselves.

¹²⁸ Melzer, *supra* note 79, at 61 (“The causation of harm in individual self-defence or defence of others against violence prohibited under IHL lacks belligerent nexus. . . . Therefore, the use of necessary and proportionate force in such situations cannot be regarded as direct participation in hostilities.”).

¹²⁹ Additional Protocol I, *supra* note 3, at art. 48.

and doctrine of distinction appear to bar the use of lethal military force in such contexts altogether.¹³⁰ The criterion established by the PPG, which requires “[n]ear certainty that non-combatants will not be injured or killed,” also plies closer to the demands of black letter LOAC. The black letter law and doctrine, however, are in tension with the loss of protected status for civilians acting in self-defense, as well as recent state practice and permissive interpretations that allow targeting individual combatants in any context, whether on the battlefield or off. Distinction needs to be reformulated to address the tensions and shortcomings in the LOAC brought to light by drone strikes outside active combat areas.

B. *Proportionality in War*

The rule of proportionality in war is a direct complement to distinction. While distinction allows foreseeable, but not intentional, civilian casualties, proportionality demands that foreseeable civilian death and injury, and damage to civilian objects, not be “excessive in relation to the concrete and direct military advantage anticipated.”¹³¹ While the rule of proportionality in war is codified only with respect to international armed conflicts, most states, including the U.S., have explicitly accepted it as a “fundamental principle” of the law of armed conflict and a binding obligation on all military operations.¹³² Despite its fundamental status, many commentators have complained that proportionality asks us to compare incommensurables, believing that civilian casualties and military advantage have no common denominator.¹³³ However, at least in defensive wars, and especially in the context of counterterrorism actions like drone strikes away from active hostilities, injury and death caused to civilians can be directly compared to the injury and death that is avoided by removing the terrorist threat. Moreover, data-driven approaches to the effects of drone strikes on enemy operations, and consequent changes to the casualty rates of both soldiers and civilian by the attacking force, can make proportionality a concrete tool to carry out more effective counterterrorism operations.

One significant drawback of proportionality, however, is that it asks commanders to focus only on the concrete and *direct* military advantage anticipated. While this formulation has the positive effect of requiring commanders to focus on the actual military advantage to be gained, rather than on

¹³⁰ By doing so, the black letter law of distinction appears to treat civilian areas away from active hostilities as if they were subject to a law enforcement, rather than a LOAC, framework. In the law enforcement context, civilians are generally not subject to foreseeable collateral damage, at least not without an overriding necessity defense where imminent danger to others is at stake.

¹³¹ Additional Protocol I, *supra* note 3, at art. 51(5)(b). *See also id.* at arts. 57(2)(a)(iii), 57(2)(b), and 85(3)(b) & (c).

¹³² *See, e.g.,* Executive Order 13732, *supra* note 4 (“As a Nation, we are steadfastly committed to complying with our obligations under the law of armed conflict, including those that address the protection of civilians, such as the fundamental principles of necessity, humanity, distinction, and proportionality.”).

¹³³ For a thorough discussion of these concerns and arguments that they are ill founded, *see* Joshua Andresen, *New Voices: Challenging the Perplexity over Jus in Bello Proportionality*, 7 EUR. J. LEGAL STUD. 19 (2014).

hypothetical or speculative advantage, it has the negative effect of asking commanders to focus on short term, rather than long term, gains.¹³⁴ As we have seen in the war on terrorism, and perhaps reflected more broadly by the Israeli experience,¹³⁵ short-term military gains, particularly those predicated on conventional military goals of depletion and attrition, may have little or no relationship to the goals of ending conflict and establishing peace and security for the long term. Thus a drone strike that causes civilian casualties, while proportionate in relation to the immediate military advantage, may have long-term negative effects. In addition to anecdotal accounts that drone strike have increased recruitment for terrorism in places such as Yemen,¹³⁶ recent empirical studies have shown real strategic costs to killing civilians, including increases in recruitment for terrorism, increases in violent attacks, increases in popular support for terrorist organizations and insurgent groups, and a general detriment to the reputation of the attacking force.¹³⁷ Even when civilian deaths do not result from a strike, injury to civilians, damage to civilian objects such as houses and livestock, as well as the negative response a population may have to the indignity of being subject to aerial strikes can all result in long term costs to a force attacking with drones.¹³⁸ Given the damage that civilian harm can do to longer term military advantage, proportionality analysis, as it is presently understood and applied, is in tension with the need to take into account the negative secondary effects of drone strikes in civilian areas. Taking into account these effects is necessary in order to assess the true military advantage of drone strikes so that military force can be used more effectively.

¹³⁴ See, e.g., INT'L COMM. OF THE RED CROSS, ICRC COMMENTARY TO PROTOCOL ADDITIONAL TO THE GENEVA CONVENTIONS OF 12 AUGUST 1949, AND RELATING TO THE PROTECTION OF VICTIMS OF INTERNATIONAL ARMED CONFLICTS (PROTOCOL I), June 8, 1977, ¶ 2209, 684 ("The expression 'concrete and direct' was intended to show that the advantage concerned should be substantial and relatively close, and that advantages which are hardly perceptible and those which would only appear in the long term should be disregarded.").

¹³⁵ Another way targeted killing can backfire is "the Hydra effect." See Blum & Heymann, *supra* note 55, at 165 ("An immediate consequence of eliminating leaders of terrorist organizations will sometimes be what may be called the Hydra effect, the rise of more-and more resolute-leaders to replace them. . . . Thus, when Israel assassinated Abbas Mussawi, Hezbollah's leader in Lebanon, in 1992, a more charismatic and successful leader, Hassan Nassrallah, succeeded Mussawi.").

¹³⁶ See, e.g., Dennis C. Blair, *Drones Alone Are Not the Answer*, N.Y. TIMES (Aug. 14, 2011), www.nytimes.com/2011/08/15/opinion/drones-alone-are-not-the-answer.html. ("[A]s the drone campaign wears on, hatred of America is increasing in Pakistan. . . . Our reliance on high-tech strikes that pose no risk to our soldiers is bitterly resented in a country that cannot duplicate such feats of warfare without cost to its own troops."). See also Ibrahim Mothana, *How Drones Help Al Qaeda*, N.Y. TIMES (June 13, 2012), www.nytimes.com/2012/06/14/opinion/how-drones-help-al-qaeda.html. The U.S. Army similarly notes in their 2006 Counterinsurgency Field Manual that "killing every insurgent is normally impossible. Attempting to do so can also be counterproductive in some cases; it risks generating popular resentment, creating martyrs that motivate new recruits, and producing cycles of revenge.", U.S. DEP'T OF THE ARMY, FM 3-24, COUNTERINSURGENCY ¶ 1-128 (2006).

¹³⁷ See, e.g., KOLENDA ET AL, *supra* note 11, at 23-25.

¹³⁸ KOLENDA ET AL, *supra* note 11, at 25 ("Civilian harm was easily exploited by the Taliban. Taliban publications, public communications, and propaganda routinely made use of incidents of civilian harm to paint U.S. forces as an indiscriminate, anti-Muslim occupation force.").

C. Precaution in Attack

An additional reason to reformulate the law governing drone strikes in areas away from active hostilities stems from the LOAC duty of precaution in attack. The duty of precaution in attack, which was first codified in AP I at articles 57 and 58, includes a variety of measures designed “to spare the civilian population, civilians and civilian objects” during military operations.¹³⁹ The ICRC includes precaution in attack as a requirement of customary international law in both international and non-international armed conflicts and the United States accepts precaution in attack as a legal obligation in both international and non-international armed conflicts.¹⁴⁰ The U.S. has also, through Executive Order 13732, put in place a policy, in “all operations involving the use of force,” to “take feasible precautions in conducting attacks to reduce the likelihood of civilian casualties, such as providing warnings to the civilian population (unless the circumstances do not permit).”¹⁴¹

The most significant issue raised by the duty of precaution in attack for drone strikes is the duty to warn.¹⁴² Although the duty to warn is expressly conditioned on the feasibility of the circumstances, it is clear that the duty to warn will never be fulfilled in the case of targeted killing away from active hostilities. In such circumstances, surprise is of the essence and any warning to the civilian population would be a warning to the target, thus compromising the mission. While the duty to warn appears to contemplate circumstances in which a warning is not feasible, civilian populated areas away from active hostilities are precisely the contexts in which a warning, at least from the civilian perspective, is most needed. In areas of active hostilities, civilians are on general alert as to the dangerousness of the circumstances and can at least contemplate leaving the area to shelter themselves and their families elsewhere.¹⁴³ In areas of active hostilities,

¹³⁹ Additional Protocol I, *supra* note 3, art. 57(1). The ICTY found in *Galić* that failure meet the precautionary requirements of LOAC are a possible indication of a violation of distinction. *Galić*, *supra* note 10, ¶142 (“In order to determine whether the attack [was] directed [against civilians], the following, inter alia, are to be considered: . . . the extent to which the attacking force may be said to have complied or attempted to comply with the precautionary requirement of the laws of war.”).

¹⁴⁰ See Brian Egan, Remarks on International Law, *supra* note 79. See also DEP’T OF THE NAVY, THE COMMANDER’S HANDBOOK ON THE LAW OF NAVAL OPERATIONS § 8.3.1 (2007) (“Naval commanders must take all reasonable precautions, taking into account military and humanitarian considerations, to keep civilian casualties and damage to the minimum consistent with mission accomplishment and the security of the force.”).

¹⁴¹ Executive Order 13732, *supra* note 4. While the U.S. has recognized the legal obligation of precaution in attack in both international and non-international armed conflicts, it is not clear whether it recognizes the legal obligation in actions taken in self-defense.

¹⁴² Additional Protocol I, *supra* note 3, at art. 57(2)(c) (“[E]ffective advance warning shall be given of attacks which may affect the civilian population, unless circumstances do not permit.”).

¹⁴³ This is all too often an abstract possibility for much of the civilian population who lacks the physical or financial ability to flee their homes. Cf. Daskal, *supra* note 80, at 1195 (“Those who remain within the conflict zone have implicitly accepted some risk, albeit not voluntarily in most cases. They can, at least in theory, take steps to protect themselves and minimize the likelihood of being caught in the crossfire . . .”).

a specific notice prior to attack works in tandem with the general notice of danger given by the ongoing hostilities themselves. By contrast, in areas away from active hostilities, civilians have no prior notice that they may be subject to the lethal dangers of war. Since a warning prior to a drone strike will always be infeasible, civilians will also never be warned of a specific strike and are thus placed at extraordinary risk.

The rules of engagement like those set out in the PPG, which require near certainty of no civilian casualties, are a sensible recognition of the special dangers of drone strikes away from active hostilities. The unique circumstances of drone strikes away from active hostilities, and the unique threat they place on civilians, both speak for altering the LOAC baseline to protect civilians where the present rules would fail. Given the impracticality of warning civilians in these contexts, tighter restrictions on targeting and a more restrictive application of proportionality are necessary to reestablish the proper balance between the pursuit of military ends and respect for civilians.

IV. Reformulating the Law Governing Lethal Force With Drones

The operating assumptions on which the LOAC principles of distinction and proportionality have developed are simply not applicable to drone strikes away from active hostilities. LOAC assumes a general separation between combatants and civilians, albeit with exceptions. In the case of drone strikes away from active combat, however, the exception is the rule. The targeted enemy will not only be intermingled with civilians, they will be virtually indistinguishable from them. Civilian casualties are not incidental in these circumstances. They are essential. As a result, distinction and proportionality should be reformulated for such contexts.

While drones pose a new and unique threat to civilians, they are responding to an unprecedented security threat from terrorism. The PPG attempts to achieve an appropriate balance between threat and response by modifying the LOAC with law enforcement principles for engagements away from active hostilities. What the PPG attempts on an ad hoc basis, however, can be better achieved by reformulating distinction and proportionality for areas away from active hostilities. Reformulating distinction and proportionality is needed both to adequately regulate drones and to lay the foundation for an international legal architecture for the use of force away from active hostilities.

A. Reformulating Distinction for Areas Away from Active Hostilities

The rule of distinction currently turns on the intention of the commander and the identity of a military objective. On the current understanding, when a commander intends to strike a single enemy combatant, distinction is satisfied regardless of the foreseeable harm to civilians and civilian objects. A focus solely on commander intention and the identity of a single militant ignores the real

world circumstances and consequences of drone strikes, especially when strikes take place in civilian populated areas away from active hostilities. Neither commander intentions nor the identity of a militant can erase the devastation brought on civilians engulfed by drone strikes. They also cannot nullify the protected status that civilians are supposed to enjoy, even when combatants are found among them. Two core LOAC principles point to a better approach: the principle established by article 50(3) of AP I, that the presence of combatants among civilians does not change civilians' protected status, and the widely accepted principle that the presence of civilians at clear military objectives does not alter the military status of the objective. Rather than focusing on commander intention, both of these principles focus on the status of people and objects occupying a geographic area. Following these principles, I suggest that rather than looking solely to commander intentions and the isolated identity of enemy combatants, distinction should be grounded in a functional analysis of the geographic area that will be destroyed by a strike—the death zone.

Before coming to the functional analysis itself, it is important to have a clear understanding of what constitutes the death zone. Munitions, such as missiles or bombs, have a “blast radius” or “casualty radius,” i.e. the area within which casualties are expected, sometimes with a certain probability. For ease of reference, this Article uses the term “death zone” to refer to the area in which death and other serious bodily injuries have a greater than 50 percent probability. Perhaps unsurprisingly, it is difficult to get precise open source data on the death zones of various munitions. The best open source estimates, from geographical surveys and witness accounts, is that the Hellfire missiles fired by Predator and Reaper drones are expected to kill everything within a 15 to 20 meter blast radius.¹⁴⁴ In addition to death, there are a wide range of serious injuries that can occur at considerably greater distances, including injury from “incineration, shrapnel, . . . the release of powerful blast waves capable of crushing internal organs . . . as well as vision and hearing loss.”¹⁴⁵ One U.S. government study concluded that sound levels from an exploding Hellfire are expected to cause permanent or temporary hearing loss in humans at a radius of up to 385 meters from the blast site.¹⁴⁶ Thus while drone strikes are very good at hitting their intended target, they are not sniper rifles. The destruction they sow spreads far beyond a single targeted combatant. The precise death zone for any particular

¹⁴⁴ Thomas Gillespie, Katrina Laygo, Noel Rayo & Erin Garcia, *Drone Bombings in the Federally Administered Tribal Areas: Public Remote Sensing Applications for Security Monitoring*, 4 J. GEOGRAPHIC INFORMATION SYSTEM 136, 139 (2012), <http://www.scirp.org/journal/PaperInformation.aspx?paperID=18766>. See also INT’L HUMAN RIGHTS AND CONFLICT RESOLUTION CLINIC (STANFORD LAW SCHOOL) AND GLOBAL JUSTICE CLINIC (N.Y. UNIV. SCHOOL OF LAW), *LIVING UNDER DRONES: DEATH, INJURY AND TRAUMA TO CIVILIANS FROM US DRONE PRACTICES IN PAKISTAN* [hereinafter *LIVING UNDER DRONES*] (Sept. 2012), https://law.stanford.edu/sites/default/files/publication/313671/doc/slspublic/Stanford_NYU_LIVING_UNDER_DRONES.pdf.

¹⁴⁵ *LIVING UNDER DRONES*, *supra* note 144, at 56 (internal citations omitted).

¹⁴⁶ R. A. Efroymson, W. Hargrove, D. S. Jones, L. L. Pater, and G. W. Suter, *The Apache Longbow-Hellfire Missile test at Yuma Proving Ground: Ecological Risk Assessment for Missile Firing*, HUMAN AND ECOLOGICAL RISK ASSESSMENT, Vol. 14, No. 5, 898, 898–918 (2008).

strike is a function of many factors, including the angle of impact and whether the missile is fired at a building or in the open. Perhaps most importantly, the Hellfire, like many other missiles today, comes with a variety of warhead options that will produce different impacts under different conditions, leading to varying death zones.¹⁴⁷ Sophisticated militaries like the U.S. armed forces are aware of the anticipated death zone with a particular missile and mission conditions and they select weapons based on those conditions and the mission objective. For the purpose of a functional analysis of the geographic area to be destroyed by a strike, the anticipated death zone with a particular missile and mission conditions is the relevant area of analysis.

Once the death zone is identified, a functional analysis for drone strikes away from active hostilities would proceed in two steps. Commanders should first determine whether there are civilians present in the death zone. This is perhaps not as straightforward as it may at first appear. By hypothesis, in cases of targeted killing, the commander will believe that an enemy combatant is present. However, the commander's belief will rarely, if ever, be based on positive identification of the targeted individual. The commander's belief will rather be based on some combination of human, imagery, and signals intelligence with an inherent level of uncertainty. Beyond the actual target, the identity of the other humans in the vicinity will likely be murkier still. Even when discrete objects are targeted, such as the passenger vehicle in the drone strike on Anwar al-Aulaqi, the identity of the full "target set," i.e. all of the people who will be killed by the strike, is rarely if ever known.¹⁴⁸ If some positive intelligence on the identity of others in the death zone is not available, then following article 50(1) of AP I, "[i]n case of doubt whether a person is a civilian, that person shall be considered to be a civilian."¹⁴⁹

¹⁴⁷ Defense Industry Daily, *US Hellfire Missile Orders, FY 2011-2016*, <http://www.defenseindustrydaily.com/us-hellfire-missile-orders-fy-2011-2014-07019/> (last updated Mar. 20, 2017).

¹⁴⁸ For instance, the Los Angeles Times quoted U.S. officials saying they "had no idea" Anwar Awlaki's 16-year-old son, Abdulrahman, was present when they fired at an outdoor café on October 14, 2011 in Yemen. Ken Dilanian, David S. Cloud, *Grieving Awlaki Family Protests Yemen Drone Strikes*, L.A. TIMES (Oct. 19, 2011), http://latimesblogs.latimes.com/world_now/2011/10/yemen-drone-awlaki-son-family.html. Other news articles have reported similar lack of knowledge of who is being targeted leading to civilian casualties, for example, Sabrina Siddiqui, *Obama "Surprised," "Upset" When Anwar Al-Awlaki's Teenage Son Was Killed By U.S. Drone Strike*, Huffington Post (Apr. 23, 2013), http://www.huffingtonpost.com/2013/04/23/obama-anwar-al-awlaki-son_n_3141688.html; C.J. Chivers, Carlotta Gall, Andrew W. Lehren, Mark Mazzetti, Jane Perlez, Eric Schmitt, *View Is Bleaker Than Official Portrayal of War in Afghanistan*, N.Y. TIMES (July 25, 2010), <http://www.nytimes.com/2010/07/26/world/asia/26warlogs.html> ("American military officials . . . point[ed] out that the target had been a senior Qaeda commander, that there had been no indications that women and children would be present . . .").

¹⁴⁹ Additional Protocol I, *supra* note 3, at art. 50(1); *but see* DoD LOW Manual, *supra* note 100, at § 5.5.3.2. ("Under customary international law, no legal presumption of civilian status exists for persons or objects."). Note that the position set forth in the DoD LOW Manual has been called into question. *See, e.g.,* Lederman, *Is it Legal to Target ISIL's Oil Facilities and Cash Stockpiles?*, JUST SEC. (May 27, 2016), <https://www.justsecurity.org/31281/legal-striking-isils-oil-facilities-cash-stockpiles>.

The default assumption established by article 50(1) is particularly appropriate in civilian populated areas away from active hostilities. If no civilians are present and a legitimate military objective has been identified, then distinction is satisfied. However, once a commander has either positively identified civilians in the death zone, or is led to conclude civilians are present because of the lack of evidence that those present are combatants, the commander should proceed to the second step.

Once a civilian presence is established positively or by default, the commander should then assess whether the death zone by its nature, location, purpose or use is substantially a civilian object. We can expect “easy” cases at both ends of the spectrum. Civilian houses, markets, eateries, and apartment buildings are each substantially civilian objects. By contrast, military bases, weapons depots, and barracks are all overwhelmingly military objects. For the former cases in which civilians are expected to be killed or seriously injured within a substantially civilian object, the functional analysis determines the death zone to be a protected civilian object that may not be attacked. This conclusion holds even though a legitimate military objective—the enemy combatant—is present in the death zone. For the latter cases in which civilians are expected to be killed or seriously injured within a clear military object, the functional analysis determines the death zone to be an unprotected military objective. This conclusion holds even though civilian casualties are expected. This allowance for civilian casualties implies the possibility of more civilian casualties than allowed under the PPG, thus allowing greater flexibility to pursue real military threats. The potential for more civilian casualties is, however, tempered by restricting civilian casualties to instances in which the death zone only contains objects that are primarily military in their nature, purpose, location or use. The higher bar required for military objects, that they be “primarily” rather than merely “substantial” military objects, is justified by the increased vulnerability and default protected status of civilians in contexts away from active hostilities.

The more difficult cases are those that fall between clear military and clear civilian objects. So-called “dual use” objects that are used by both civilians and combatants will require additional analysis or intelligence to support a strike. It is worth noting, however, that the most common dual use targets, such as bridges or electrical grids, will not be the object of targeted killing. Moreover, where the target is, indeed, an object like a bridge, a surprise attack is not needed and civilians in the vicinity can be warned prior to the strike.¹⁵⁰ Where the target is an actual person and the death zone contains an object that is used by both combatants and civilians, then an assessment of the function of the object is required. Where the death zone contains, for example, an apartment building or guest house, a determination must be made of whether it is substantially used by civilians. If it is, then the fact that it may also be used by combatants does not

¹⁵⁰ Though even dual-use objects remain subject to proportionality analysis. For a discussion of a recent finding by the ICTY that the bombing of a dual-use bridge violated proportionality, *see* Lederman, *supra* note 149.

alter the fact that it is a substantially civilian object that retains its protected status.¹⁵¹ By contrast, if the death zone is primarily an al-Qaeda training camp or compound,¹⁵² then, despite the fact that it may occasionally be used by civilians or have some civilians present, it qualifies as a military object for the purposes of distinction and the commander can proceed to the proportionality analysis.

Although the functional analysis this Article proposes requires consideration of factors other than commander intention, it still necessarily depends on commander intention to target enemy combatants. The functional approach is thus built on top of the fundamental rule of distinction that requires targeting of military objectives only. The functional approach simply adds a level of analysis to distinction that will potentially bar strikes in areas away from active hostilities that the conventional approach would permit. Although the functional approach could also be applied in more conventional areas of active hostilities, it may prove overly restrictive in such areas or possibly be seen as incentivizing the enemy to violate LOAC in order to shield itself from attack. In areas away from active hostilities, however, civilians are owed an additional duty of care, as we recognize both in the law enforcement context and in the black letter law and doctrine of distinction, and as implicitly recognized by the PPG.

B. Reformulating Proportionality for Areas Away from Active Hostilities

When drone strikes away from active hostilities satisfy the functional analysis of distinction, an analysis of proportionality will be required. As the ICTY recently demonstrated in the *Prlić* case, proportionality can and should take into account not just the immediate effects such as death or injury to the civilian population, but also the longer-term effects wrought by military destruction.¹⁵³ In addition to negative effects on civilians beyond immediate death, injury, and damage to property, proportionality should also take into account the strategic costs and negative secondary effects of deploying aerial strikes in civilian areas. This means that even where civilian casualties may appear proportionate in relation to the concrete and direct military advantage, the longer-term view of military advantage may be considerably dimmer if the strike and civilian casualties engender increased enemy violence and greater popular support for the enemy. These negative secondary effects are more likely in the case of drone strikes because they are more likely to be carried out in civilian populated areas. Though most recent studies point to the predominance of negative effects from

¹⁵¹ The same result would follow for a civilian apartment building containing a weapons cache in the basement.

¹⁵² For an insightful analysis of the probative value of presence at an al-Qaeda training camp or guesthouse, see Wittes, *supra* note 80.

¹⁵³ Prosecutor v. Prlić, IT-04-74-T, Judgment, ¶1583-84 (Int'l Crim. Trib. for the Former Yugoslavia May 29, 2013) ("The Chamber also determined that the destruction of the Old Bridge had a very significant psychological impact on the Muslim population of Mostar. The Chamber . . . therefore holds by a majority, that the impact on the Muslim civilian population of Mostar was disproportionate to the concrete and direct military advantage expected by the destruction of the Old Bridge.").

drone strikes, there may also be positive secondary effects which should be counted as well in assessing proportionality.¹⁵⁴

As with the reformed approach to distinction this Article advocates, a reformed approach to proportionality should proceed in two steps. The first step involves a traditional assessment of the immediate anticipated effects of the proposed strike. These include both the concrete and direct military advantage and the harm to civilians and civilian objects. The immediate harm to civilians and civilian objects should be relatively straightforward. Given available data on blast radii, the harms associated with missile explosions, and a range of human, signals, and imagery intelligence of the blast site, it should be feasible to conduct a relatively accurate assessment of the number of civilians likely to be killed and injured, and the anticipated damage to civilian objects.

An accurate assessment of the concrete and direct military advantage requires greater analysis. Because we are talking about drone strikes away from active hostilities, the concrete and direct military advantage should be assessed in terms of the value of the target, the likelihood of eliminating the target, and the rarity or repeatability of the opportunity to strike the target. In assessing the value of the target, more weight should be given to targets whose elimination will more significantly disrupt enemy operations and save lives. Since, however, the strikes in question are in areas away from active hostilities, the link between a particular target, e.g. an al-Qaeda commander, and operational capacity will have to depend to a large extent on intelligence data and the ability to predict future operations based on past behavior. Where, for example, an al-Qaeda commander has been responsible for directing attacks that have killed hundreds of civilians or soldiers and intelligence indicates that he is still active in organizing attacks, there is a strong indication of a high value target. Where there is further intelligence that the commander could not be easily replaced, at least not without disrupting operational capacity elsewhere, there would be strong confirmation of the high value of the target. By contrast, if the target were a common foot soldier about whom there was little or no evidence of involvement in attacks, and who could be easily replaced by others, the target would be of very low value.

Once the value of the target is assessed, it should be modified by the anticipated likelihood of success. Perhaps surprisingly, given their highly touted accuracy, drones frequently miss their intended target and hit unintended targets. For instance, Anwar al-Aulaqi, an American citizen and leader of al-Qaeda in the Arabian Peninsula, evaded a drone strike at least once before being killed by drones in 2011.¹⁵⁵ More tragically, al-Aulaqi's sixteen-year-old American son, Abdulrahman, was killed in another strike in Yemen two weeks later. In the latter strike, which targeted an outdoor eatery, two minors and ten adults were killed on

¹⁵⁴ For reference to possible positive short-term effects of aerial strikes, see Lyall, *supra* note 11.

¹⁵⁵ Mazzetti et al., *supra* note 36.

the basis of bad intelligence.¹⁵⁶ The intended al-Qaeda target was not, in fact, present. A realistic commander will thus need to modify the assessed value of the target by the likelihood of actually eliminating it in the proposed strike. For example, where there is a sixty percent likelihood of success, the value should be reduced to sixty percent of the original assessment.

Finally, the valuation of the target should take into account the relative availability of targeting opportunities. Where opportunities are very rare, the value of a particular strike will not be reduced by availability considerations. Where, however, opportunities are standing or anticipated to arise frequently in the future, the advantage of the proposed strike may be reduced. A reduction would be in order, for instance, if significant civilian casualties or negative secondary effects were likely to result from the strike. It may also be incumbent on the commander, following the demands of precaution in attack, to alter the timing or location of the strike to avoid civilian casualties and future negative repercussions on the military advantage of the strike.

Once the immediate effects of a proposed strike have been assessed, an analysis of the secondary effects of the strike should be conducted, particularly those negative secondary effects that drive down the military advantage of the strike. Among the secondary effects of a strike that should be considered are its tendencies to hasten or forestall peace negotiations,¹⁵⁷ result in longer-term incapacitation or reinvigoration,¹⁵⁸ or result in greater enemy recruitment or popular support.¹⁵⁹ While analysis of secondary effects may be more complex than analysis of immediate effects, the military, the intelligence community, and the interagency as a whole have the collection and analytic capacity and could be tasked with supplying the analysis to decision makers with command responsibility. In fact, after hundreds of drone strikes and fifteen years of war, data on the actual long-term effects of drones strikes is already being produced by academics and NGOs. This data should be highly desirable for military planners who seek to prosecute a more effective war with an end horizon.

Some have called into question the usefulness of taking into account the long-term effects of drone strikes, or claimed that the need to take them into account does not arise uniquely with drones. However, they typically

¹⁵⁶ See *id.* (“[A] missile apparently intended for an Egyptian Qaeda operative, Ibrahim al-Banna, hit a modest outdoor eating place in Shabwa. The intelligence was bad: Mr. Banna was not there, and among about a dozen men killed was the young Abdulrahman al-Awlaki, who had no connection to terrorism and would never have been deliberately targeted.”).

¹⁵⁷ Declan Walsh, Ihsanullah Tipu Mehsud & Ismail Khan, *Drone Strikes Are Said to Kill Taliban Chief*, N.Y. TIMES (Nov. 1, 2011), <http://www.nytimes.com/2013/11/02/world/asia/drone-strike-hits-compound-used-by-pakistani-taliban-leader.html> (“Mr. Mehsud’s death also comes at a delicate time. Just last week Prime Minister Nawaz Sharif of Pakistan, who strenuously opposes drone strikes, met with President Obama at the White House to express that opposition. Mr. Sharif’s plans to engage in peace talks with the Pakistani Taliban have also been thrown into disarray . . . by Friday’s attack.”).

¹⁵⁸ See Blum & Heymann, *supra* note 55.

¹⁵⁹ See, e.g., KOLENDA ET AL., *supra* note 11, at 23–25.

overestimate the reliability of assessments of military advantage and underestimate the unique impact of drone strikes. For example, Bradley Strawser questions whether “future costs” could be known with a sufficiently high degree of confidence to count in the proportionality calculation.¹⁶⁰ This is an empirical question, of course, but it is one that we should want to be able to answer. This is particularly true with drone strikes away from active hostilities, because the benefit we aim to derive will always be at least somewhat speculative as to the future harm averted by eliminating a particular terrorist or enemy combatant. Unlike the conventional context where depletion and attrition of the enemy frequently have immediate positive effects, drone strikes away from active hostilities will always be carried out with some intermediate or longer-term objective in mind. Insofar as we cannot even choose an appropriate target without assessing its intermediate and long term benefit, we should also be concerned to assess its intermediate and long-term costs. While the requirement to assess the secondary effects of drone strikes may not always be appropriate for a court of law to enforce, it should be attractive to both military commanders and political leaders who seek to direct more effective uses of force.

Conclusion

The LOAC is currently inadequate to address the expansion of lethal force into areas away from active hostilities. The core assumption of the LOAC, that civilians and combatants will be generally separate from one another, is not realized in areas away from active combat. As a result, both distinction and proportionality need to be reformulated for the unique context of drone strikes away from active hostilities.

A natural objection to the reformulations of distinction and proportionality defended in this Article is that, by going beyond the current LOAC baselines, they may prove too restrictive on the use of force. Thus while the PPG has imposed restrictions on drone strikes away from active hostilities in ways that go beyond my proposals, e.g. by requiring near certainty of zero civilian casualties, the PPG, as policy, leaves an escape valve for more permissive use when circumstances demand it. The rules proposed here do, however, provide greater flexibility than the PPG. The functional analysis of distinction means that the availability of drone strikes will depend on the context in which force will be used rather than blanket policy demands. While the proposed rules better respect the protected status of civilians, they also allow greater engagement of clear military objects, even when civilians are present. In addition to the flexibility built into my approach, an escape valve for truly extraordinary circumstances could be found in the necessity defense.¹⁶¹ However, adequate protections against the over-use of

¹⁶⁰ Strawser, *supra* note 42, at 15.

¹⁶¹ *Cf.* Justice Aharon Barak’s discussion of the necessity defense as a possible justification for torture in extraordinary circumstances. H CJ 5100/94 Public Committee against Torture v. State of Israel (1999) IsrSC 53(4), 817.

the necessity defense would be needed to ensure against its misuse.¹⁶² Finally, the approach to distinction and proportionality that I have defended is predicated on the view that our military advantage and the protection of civilians are complementary rather than opposed. We use force in order to restore our security. Given the negative effects that follow on civilian casualties, measures that avoid them will increase the military advantage of strikes and better serve our national security. The proposed reforms of distinction and proportionality for areas away from active combat will enable us to use lethal force more appropriately and with clearer recognition of the unique risks drone strikes impose on civilians. As a result, we will fight more effectively and with fewer civilian casualties.

A final objection, posed by Jeremy Waldron, is that there may be “considerable risk” in attempting to revise or reformulate LOAC principles because new ones may not as readily anchor themselves in the “habit, ethos, and discipline” that presently characterize the conduct of war.¹⁶³ While it is important to consider the harm that can be done by attempting to revise a legal architecture that has only gained universal acceptance in the last decades, Waldron’s concern underestimates the extent to which LOAC operates as a minimum threshold that is almost always modified by more restrictive Rules of Engagement (ROE). Soldiers are thus already accustomed to the need to accommodate different strictures on their actions according to the ROE specified for the situation. Moreover, the modifications to distinction and proportionality suggested here start with the baseline LOAC principles and introduce rules of analysis specifically adapted to the unique context of drone strikes away from active hostilities.

Since drones have put lethal force on the table where it would otherwise be absent, thereby subjecting civilians to unique harms in areas away from active hostilities, it is incumbent upon political and military leaders to reformulate appropriate legal requirements for such use. While the PPG has been a step in the right direction, the formulation and avowal of durable legal obligations that adequately accord with the protected status of civilians, while also ensuring flexibility to strike legitimate military objectives, are needed. Although the United States has been at the forefront of state practice and policy for the use of force in areas away from active hostilities, other states, both friendly and more antagonistic, are not far behind.¹⁶⁴ Constructing a legal architecture for drones

¹⁶² For a trenchant analysis of role that the necessity defense has played in promoting torture in Israel, see Itamar Mann and Omer Shatz, *The Necessity Procedure: Laws of Torture in Israel and Beyond, 1987–2009*, 6 UNBOUND: HARV. J. LEG. LEFT 59, 63 (2010) (“[A]fter [the] *Public Committee* [case] . . . torture became more solidly centralized, organized, and managed from above.”).

¹⁶³ Jeremy Waldron, *Can Targeted Killing Work as a Neutral Principle*, NYU Public Law and Legal Theory Working Papers, No. 11-20 (Mar. 1, 2011), http://papers.ssrn.com/sol3/papers.cfm?abstract_id=1788226.

¹⁶⁴ A growing list of countries now use armed drones, with at least six using them for targeted killing (the U.S., U.K., Israel, Pakistan, Iraq, and Afghanistan), and the latter three using Chinese-made drones. Russia, Iran, India, and Jordan are among other states now using armed drones. W.J. Hennigan, *A Fast Growing Club: Countries That Use Drones for Killing by Remote Control*, L.A.

now will ensure that the U.S. maintains its leadership in the formation of customary international law that serves both our interests and our values.