Cluster Munitions: Wonder Weapon or Humanitarian Horror?

But at the end of the day, I believe we should be guided by the conviction that this is, above all, a moral issue. Weapons that are inherently indiscriminate, whether by design or effect, should have no place in today's world. ¹

—Sen. Leahy

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Recent international humanitarian efforts have targeted cluster munitions (CMs) as the latest cause *de jour* to eliminate harm to civilians on the battlefield. In May of 2008, over 100 nations met in Dublin, Ireland and produced an agreement that would ban the use, production, transfer, and stockpiling of CMs.² This diplomatic conference produced the Convention on Cluster Munitions (CCM).³ Although the heart of the treaty deals with the prohibition on the use, production and transfer of such weapons, the treaty also contains language that prohibits each state party from assisting, encouraging or inducing anyone to take action prohibited by the treaty.⁴ This is particularly significant to the United States in this era of coalition operations given our reliance on CMs as an intricate part of any warfighting plan.

United States policy is that CMs are legitimate weapons with clear military utility.⁵ Cluster munitions remain an important part of the U.S. Armed Forces inventory and are an important weapon "to engage area targets that include massed formations of enemy forces, individual targets dispersed over a defined area, targets whose precise location are not known, and time sensitive or moving targets." Both the Army and the Air Force have stockpiles of CMs. However the Army inventory has over 90% of the total, including over 600 million CMs, primarily in their multiple launch rocket system, Army tactical missile system, and in the dual purpose improved conventional munitions.⁷

Cluster munitions are groups of smaller bombs that are dropped together in a large bomb canister (or case) that is designed to break apart in flight and distribute the submunitions or bomblets over a wide area. Each submunition has a fuse that, depending on how it is set, will cause it to explode either at a certain height above ground, on impact, or in a delayed mode. These CMs, generally designated as cluster bomb units, are very effective against troops in the open and there are several variants including anti-armor, anti-personnel, and anti-materiel. These CMs can either be delivered by fixed wing aircraft, by artillery, or by rocket. In 1991, during Operation Desert Storm, CMs were used extensively by coalition forces—over 61,000 were dropped on a variety of targets including Iraqi conventional forces, early warning radars, surface to air missile sites, and Iraqi infrastructure that could support the war effort such as communications and transportation facilities. Cluster munitions have also been used by the United States extensively during Operation Allied Force (Balkans 1999), Operation Enduring Freedom (Afghanistan 2002) and Operation Iraqi Freedom (2003).

¹ Cluster Munitions Survivors Forum World Conference on Cluster Munitions, STATES NEWS SERV., May 26, 2008, [hereinafter World Conference on Cluster Munitions].

² Cluster Bomb Ban Treaty Approved, BBC NEWS, May 28, 2008, http://news.bbc.co.uk/1/hi/world/europe/7423714.stm.

³ Convention of Cluster Munitions, 30 May 2008 [hereinafter CCM], available at http://www.icrc.org/ihl.nsf/INTRO/620?OpenDocument.

⁴ Id. art. 1, para. 1(c).

⁵ Memorandum from Sec'y of Defense to Sec'ys of the Military Dep'ts et al., subject: DoD Policy on Cluster Munitions and Unintended Harm to Civilians (U) (13 June 2008) [hereinafter DoD Policy Memo].

⁶ *Id*.

⁷ Information Paper, Richard Jackson, Special Assistant to the Judge Advocate Gen. on Law of War, Office of the Judge Advocate Gen., Int'l & Operational Law Div. (23 Sept. 2008) [hereinafter Jackson Info Paper].

⁸ ERIC PROKOSCH, THE TECHNOLOGY OF KILLING, A MILITARY AND POLITICAL HISTORY OF ANTIPERSONNEL WEAPONS 82 (1995).

⁹ U.S. Dep't of the Air Force, Air Univ., *Cluster Bombs*, *available at* http://www.au.af.mil/database/projects/ay1966/acsc/96-004/hardware/docs/cluster/htm (last visited Dec. 19, 2009).

¹⁰ Major Thomas J. Herthel, On the Chopping Block: Cluster Munitions and the Law of War, 51 A.F. L. REV. 229 (2001).

¹¹ See generally Ticking Time Bombs, 11 HUMAN RIGHTS WATCH NO. 6 (June 1999), available at http://www.hrw.org/legacy/reports/1999/nato2/.

However, it was the Israeli use of CMs during their invasion of Lebanon in 2006 that was the real catalyst for the renewed emphasis to ban CMs. An Amnesty International report on the conflict condemned the Israeli use of CMs—calling it "indiscriminate and disproportionate." Mounting civilian casualties, apparently caused by the Israeli use of CMs during the last few days of the conflict, resulted in an investigation by the UN Human Rights Council. The investigation produced a report that accused Israel of the improper use of CMs, resulting in human rights violations. In Investigation produced UN Council, said "[w]hat is shocking and completely immoral is 90% of the cluster bomb strikes occurred in the last 72 hours of the conflict, when we knew there would be resolution." Excessive civilian casualties in the conflict resulted in calls for international regulation on the use and production of CMs.

Years before the negotiations for the Oslo Treaty concluded in 2008, there was a steady chorus from the international humanitarian community and certain individual nations that the use of CMs failed to adhere to one of the foundational principles under the law of war—that of distinction. Specifically, they argued that CMs are unlawful because their bomblets, which spread over such a wide area, cannot be employed with the required level of accuracy to discriminate between a legitimate military objective and surrounding civilians and infrastructure. Also there is the additional concern that because of the high "dud" rate (sub-munitions that fail to explode as designed) of certain types of cluster bombs, the use of these munitions violate the principle of discrimination because the persistent and dangerous explosive remnants threaten civilians returning to the area long after the battle is over. 17

The first concern of the opponents of CMs is easily dismissed. No weapon is required to be delivered with pinpoint accuracy. From the individual rifleman laying down suppressive fire, to the battleship firing a 16-inch shell from fifteen miles away against a target located in a certain grid square, the law of war has never required that a weapon be delivered with pinpoint precision. Indeed, if anything, the precision guided munitions (PGMs) that characterize such CMs have made for an increase in bombing accuracy and effectiveness since World War II. Artillery using indirect fire is by its very nature an area weapon, and such shells are designed to throw their fragments over as large an area as possible. While there is always the affirmative obligation of the commander or Soldier to identify their target as a military objective before employing kinetic means, those means need not be a perfect laser beam of lethality that will with 100% certainty destroy only the military objective, causing no collateral damage. If that were the case, there would be no need for commanders and Soldiers to engage in the delicate and difficult balancing test that is the proportionality principle.

It took 108 B-17 bombers, crewed by 1080 airmen, dropping 648 bombs to guarantee a 96 per cent chance of getting just two hits inside a 400 x 500 feet German power-generation plant; in contrast, in the Gulf War, a single strike aircraft with one or two crewmen, dropping two laser-guided bombs, could achieve the same results with essentially a 100 per cent expectation of hitting the target, short of a material failure of the bombs themselves..

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¹² Israel to Probe Cluster Bomb Use, BBC NEWS, 21 Nov. 2006, available at http://news.bbc.co.uk/2/hi/middle east/6167458.stm.

¹³ *Id*.

¹⁴ Id

¹⁵ Mark Tran, US Studies Israel's Cluster Bomb Use, GUARDIAN (London), Jan. 29, 2007 (quoting Jan Egelend, UN humanitarian chief), available at http://www.guardian.co.uk/world/2007/jan/29/israelandthepalestinians.usa.

¹⁶ INT'L COMM. OF THE RED CROSS, CONFERENCE OF GOVERNMENTAL EXPERTS ON THE USE OF CERTAIN CONVENTIONAL WEAPONS (SECOND SESSION-LUGANO) 1999 (1976) [hereinafter LUGANO CONFERENCE].

¹⁷ Herthel, *supra* note 10, at 336.

¹⁸ The law of war implicitly recognizes this concept in its definition of proportionality as found in Article 51(5)(b) of Protocol Additional to the Geneva Conventions of 12 August 1949, and Relating to the Protection of Victims of International Armed Conflicts (Protocol I). Protocol Additional to the Geneva Conventions of 12 August 1949, and Relating to the Protection of Victims of International Armed Conflicts (Protocol I) art. 51(5)(b), June 8, 1977, 1125 U.N.T.S. 3, 26 [hereinafter Protocol I]. Article 51(5)(b) prohibits attacks which are "may be expected to cause incidental loss of civilian life, injury to civilians, damage to civilians objects, or a combination thereof, which would be excessive in relation to the concrete and direct military advantage to be gained." *Id.* art. 51(5)(b). The idea that the law of war demands that commanders weigh the collateral damage that his targeting decision causes with the military advantage to be gained recognizes that no weapon can hit with pinpoint accuracy every time and that there will be some collateral damage caused by weapons that hit unintended non-military targets.

¹⁹ See, e.g., Richard P. Hallion, Precision Guided Munitions and the New Era of Warfare (Air Power Studies Centre, Paper No. 53, 1995), available at http://www.fas.org/man/dod-101/sys/smart/docs/paper53.htm.

²⁰ See Protocol I, supra note 18, art. 48. In order to ensure respect for and protection of civilian population and civilian objects, the parties 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. *Id.*

²¹ For a discussion of proportionality, see *supra* note 18.

The distinction concerns of the opponents of CMs are more difficult to resolve. The opponents of CMs allege that because of the particularly high unexploded ordinance (UXO) rate of some of the sub-munitions, civilians (especially children) are at great risk for becoming casualties when such unexploded CMs are disturbed.²² The problem is further exacerbated by the fact that many of the submunitions are colored in orange or yellow hues. While this coloring scheme makes it easier for explosive ordnance demolition (EOD) teams to find and disarm or destroy such UXO, it also makes such bomblets the proverbial "attractive nuisance" to small children.

The UXO rate of CMs is difficult to approximate. Some studies have put it at between 5 and 7%, ²³ while others have put it as high as 30%. ²⁴ The UXO problem was recognized by the U.S. military and addressed in the 13 June 2008 Department of Defense (DoD) Policy on Cluster Munitions and Unintended Harm to Civilians. ²⁵ The policy states:

After 2018, the Military Department and Combatant Commands will only employ cluster munitions containing submunitions that, after arming, do not result in more than 1% unexploded ordnance (UXO) across the range of intended operational environments. The 1% UXO limit will not be waived. Although the use of self-deactivation devices or mechanisms can reduce the harm to civilians, self-deactivated submunitions will still be considered UXO.²⁶

Also, "[u]ntil the end of 2018, use of cluster munitions that exceed the 1% UXO rate must be approved by the Combatant Commander."²⁷

The United States also actively sought to reduce the threat to civilians posed by CMs by negotiating the Explosive Remnants of War (ERW) Protocol V²⁸ to the Certain Conventional Weapons Treaty (CCW).²⁹ The ERW Protocol requires State Parties to mark locations of ERW (including unexploded CMs), transmit information about their locations after the conflict, prohibit civilians from entering hazardous areas, and endeavour to clean up explosive remnants after the conflict.³⁰ In addition, "best practices," contained in a technical annex, were intended to improve the reliability of such weapons, to "minimize the occurrence of explosive remnants of war."³¹ Actual implementation of this protocol could have provided considerable relief from CMs. But the urgency from public outcry after the Israel-Lebanon conflict, drove expedited efforts to regulate the use of CMs.³²

Finally, in November of 2007, parties to that treaty agreed to attempt to "negotiate a proposal" on such munitions. The ERW process was in many ways short-circuited by the ultra-fast negotiation and passage of the CCM in Oslo, an international negotiation process outside of the CCW process, which requires consensus-building between State Parties to

²² Paul Wiseman, *Cluster Bombs Kill in Iraq, Even after Shooting Ends*, USA TODAY, Dec. 16, 2003, *available at* http://www.usatoday.com/news/world/iraq/2003-12-10-cluster-bomb-cover x.htm.

²³ Ron Laurenzo, Cluster Bomb Dud Rates Cut, Army Says, DEFENSE WK., June 1, 1999, at 3.

²⁴ Robert Evans, US Insists Cluster Bombs Not Bad If Used Right, REUTERS UK, Jan. 16, 2008, http://uk.reuters.com/article/homepageCrisis/idUKL 16822789. CH .242020080116.

²⁵ See DoD Policy Memo, supra note 5.

²⁶ *Id.* at 2.

²⁷ Id.

²⁸ Protocol on Explosive Remnants of War (Protocol V), reprinted in Int'l & Operational L. Dep't, The Judge Advocate General's Legal Ctr. & Sch., U.S. Army, Law of War Documentary Supplement 427 (2008) [hereinafter ERW].

²⁹ Convention on Prohibitions or Restrictions on the Use of Certain Conventional Weapons Which May Be Deemed to Be Excessively Injurious or to Have Indiscriminate Effects, Oct. 10, 1980, 1342 U.N.T.S. 137 [hereinafter CCW], *reprinted in ADAM ROBERTS & RICHARD GUELFF*, DOCUMENTS ON THE LAW OF WAR 515 (2001).

³⁰ See id.; ERW, supra note 28, at 427 (2008).

³¹ CCW, supra note 29.

³² See, e.g., UN Position on Cluster Munitions at 2007 Meeting of States Parties to the CCW.

³³ John Borrie, *How the Cluster Munition Ban Was Won: Oslo Treaty Negotiations Conclude in Dublin*, DISARMAMENT DIPL., No. 88, Summer 2008, available at http://www.acronym.org.uk/dd/dd88/88jb.htm.

obtain unanimous consent over each protocol.³⁴ There will be further CCW cluster munition discussions in February, April, and at the CCW Revision Conference in November of 2009.³⁵

The result of such a streamlined, outside the normal channel negotiating process was that most of the major manufacturers and largest militaries that plan on using CMs, such as the United States, Russia, China, Israel, India, and Pakistan, did not participate in the negotiations or sign the Oslo Treaty.³⁶ In fact, Mr. Stephen Mull, Acting Assistant Secretary for Political-Military Affairs for the United States State Department stated that "unless you get all the major producers and users of these weapons to agree on how they're going to regulate them, the—you're not going to meet your goal of addressing the humanitarian impact of them."³⁷

While the success of such a treaty, which does not include the major players in the cluster bomb world, is doubtful at best, many of the proponents of the treaty hope that "even without China, India, Pakistan, Russia and the US coming on board in the short term, the treaty's ban on cluster munitions will nevertheless have a stigmatizing effect on the use and transfer of these inhumane weapons." 38

Also,

[t]hey note that, despite some significant countries not joining major disarmament-related treaties in the past, they have often had an eventual change of heart [a]nd they cite the effectiveness of the Mine Ban Treaty in stigmatizing anti-personnel mine production, transfer and use, not only among states but non-state armed groups.³⁹

The introductory clause of the CCM speaks to the underlying humanitarian purpose of the treaty. Such language as "[d] eeply concerned that civilian populations and individual civilians continue to bear the brunt of armed conflict . . . [d] etermined to put an end for all time to the suffering and casualties caused by Cluster bombs . . . [c] oncerned that cluster munitions remnants kill or maim civilians"⁴⁰ clearly indicates the overriding humanitarian mission of the state parties to the convention.

Article 2 of the treaty provides several definitions, not all of which are in agreement with the U.S. Department of Defense position. While the treaty's definition of CMs is only a sentence long, what is excluded from the definition takes up an additional sixteen lines and is at least as important as what is considered a CM:

Cluster munition means a conventional munition that is designed to disperse or release explosive submunitions each weighing less than 20 kilograms, and includes those exploded submunitions. It does not mean the following:

- (a) A munition or submunition designed to dispense flares, smoke pyrotechnics or chaff; a munition designed exclusively for an air defense role;
- (b) A munition or submunition designed to produce electrical or electronic effects;
- (c) A munition that, in order to avoid indiscriminate area effects and the risks posed by unexploded submunitions, has all of the following characteristics:

³⁵ E-mail from Mr. Richard B. Jackson, Special Assistant to the Judge Advocate General on Law of War to Colonel Mark S. Martins (16 Dec. 2008, 14:48 EST) (on file with author).

³⁴ CCM, *supra* note 3, art 8, at 523.

³⁶ Kevin Sullivan & Josh White, 111 Nations, Minus the U.S., Agree to Cluster-Bomb Ban, WASH. POST (Foreign Serv.), May 29, 2008, at A01, available at http://www.washingtonpost.com/wp-dyn/content/story/2008/05/28/ST2008052803176.html.

³⁷ Stephen D. Mull, Acting Assistant Sec'y for Political-Military Affairs, On-the-record-briefing on U.S. Cluster Munition Pol'y, Wash., D.C. (21 May 2008) (transcript available at http://www.america.gov/st/texttrans-english/2008/May/20080522163101eaifas0.8921015.html).

³⁸ Borrie, *supra* note 33, at 16 (citing Sam Cassanos, Rights: *Cluster Bomb Treaty's Moral Force May Deter U.S.*, INTER PRESS SERV. (July 14, 2008), http://www.ipsnews.net/news.asp?idnews=43177).

³⁹ *Id.* (citing Mylena Fiori, *Brazil will Stick to the Agreement to End the production of Cluster Bombs*, AGÊNCIA BRASIL, June 17, 2008, http://www.agenciabrasil.gov.br/noticias/2008/06/17/materia.2008-06-17.4882961072/view; BRIAN RAPPERT, A CONVENTION BEYOND THE CONVENTION: STIGMA, HUMANITARIAN STANDARDS AND THE OSLO PROCESS, LANDMINE ACTION (London 2008)).

⁴⁰ See CCM, supra note 3, pmbl. (emphasis added).

- (i) Each munition contains fewer than ten explosive submunitions;
- (ii) Each explosive submunition weighs more than four kilograms;
- (iii) Each explosive submunition is designed to detect and engage a single target objective;
- (iv) Each explosive submunition is equipped with an electronic self-destruct mechanism;
- (v) Each explosive submunition is equipped with an electronic Self-deactivating feature;⁴

The DoD policy letter contains a slightly different definition:

For the purposes of this policy, cluster munitions are defined as munitions composed of a non-reusable canister or delivery body containing multiple, conventional explosive submunitions. Excluded from the definition are nuclear, chemical, and biological weapons as well as obscurants, pyrotechnics, non-lethal systems (e.g. leaflets), non-explosive kinetic effect submunitions (e.g. flechettes or rods) or electronic effects.

Landmine submunitions are also excluded since they are covered by existing policy and international agreements. 42

Another important definition in Article I is that of the word "Transfer":

"Transfer" involves, in addition to the physical movement of cluster munitions into or from national territory, the transfer of title to and control over cluster munitions, but does not involve the transfer of territory containing cluster munition remnants.⁴³

This is particularly important to the United States because of interoperability concerns with our allies. A reasonable reading of the passage would suggest that a country that has signed on to the Oslo Treaty may not allow the United States to transport CMs through any sector that the signatory is responsible for. The ramifications are obvious. In coalition operations where different NATO allies are responsible for specific sectors in a country or region (such as Kosovo or Afghanistan), the difficulties for the United States in transporting CMs from the airhead or sea port to the units that need them, may well involve travel through multiple national sectors.⁴⁴

Throughout the Oslo negotiation process, interoperability with coalition partners was a major concern, not only of the United States, but for many of the key proponents of the treaty. Many of these nations realized that not only was it highly likely that their militaries would be engaged in coalition operations with the United States in the future, but they must also protect their servicemembers from possible criminal prosecution in coalition operations where cluster bombs were used by a country that was not a party to the convention.⁴⁵

Article 21 of the treaty seeks to ameliorate many of the concerns of these signatories. Concerned about future joint operations with their militaries and the U.S. Armed Forces, key U.S. allies obtained the so called "interoperability exception" outlined in Article 21.⁴⁶ The exception outlines under what circumstances signatories to the treaty may engage in military operations with countries that have not signed onto Oslo. Specifically, paragraph 3 of Article 21 states

Notwithstanding the provisions of Article 1 of this Convention and in accordance with international law, State Parties, their military personnel or nationals, may engage in military cooperation and operations with States not party to this Convention that might engage in activities prohibited to a State Party.⁴⁷

⁴² See DoD Policy Memo, supra note 5.

⁴¹ *Id.* art. 2.

⁴³ See CCM, supra note 3, art. 2, para. 8.

⁴⁴ There are of course even issues with the United States having these munitions on their military bases in the home territory of NATO allies such as Germany and Great Britain. In some cases, international agreements on the legal status of the base is such that the home country does not exercise national jurisdiction over the property—such as in the case of U.S. bases in Germany.

⁴⁵ See Borrie, supra note 33 and interoperability discussion on pp. 32–33.

⁴⁶ See Jackson Information Paper, supra note 7.

⁴⁷ CCM, *supra* note 3, art. 21, para. 3.

Obviously the language of may engage in military cooperation and operations with states not a party to this Convention opens up a panoply of questions on what is and is not permitted by the so-called interoperability exception. Can the cooperation include the storage of U.S. CMs on a U.S.-controlled base inside a signatory to the Oslo Treaty? Can military cooperation include the mere transport of CMs through an airport that an ally controls on the way to their final U.S. sector destination? Can a sixty-year-old alliance such as NATO be the basis for the exception that allows for military operations with a non-signatory to the treaty? For example, could the United States and Germany conduct joint training together where the United States drops CMs as part of a live fire? Is a UN resolution authorizing a multi-national military operation required as the *sin equa non* for the interoperability exception to apply? There are numerous questions that have yet to be answered regarding the complete meaning of Article 21.

There are currently negotiations ongoing with many of the United States' closest allies—the United Kingdom, Japan, Germany, Norway, and Afghanistan—on how the interoperability exception will impact on not only our storage of CMs inside their sovereign territory, but on the impact of United States transport of such munitions through their air and sea ports on a temporary basis.⁴⁸ The outcome of such talks will obviously have major ramifications on U.S. strategy, not only for the global war on terror, but for any confrontation with a peer competitor in the near future.

In conclusion, the Oslo Treaty stands as just one of the many challenges for the United States as it attempts to wage the war on terror. The fact that over one hundred nations have signed the treaty, including many of our closest NATO allies and other coalition partners, means that it is an international agreement that the United States cannot simply ignore. Although the full extent of the interoperability exception described in Article 21 has yet to be fully defined, all practitioners need to be aware of the restrictions and the policies of coalition partners as they are involved in joint planning and operations. Although the United States remains committed to minimizing the harm to civilians caused by unexploded ordnance from cluster bombs, for policy reasons it has decided to do so by means of the Certain Convention Weapons Treaty and/or policy decision papers such as the one dated June 13, 2008. Practitioners need to be fully aware of U.S. policy on the use of CMs and future measures the United States is taking to improve the UXO rate of such weapons.

⁴⁸ See DoD Policy Memo, supra note 5.

⁴⁹ Many would argue that since the majority of the world's significant military powers are not signatories to the Oslo Treaty the agreement must be more symbolic than enforceable international law. However, critics of cluster munitions hope the treaty will gain moral authority and stigmatize the use of the weapons resulting in the reduced use of the munitions. *See, e.g.*, Liz Sly, *Can the Cluster Bomb Be More Than a Symbol?*, CHI. TRIB., Dec. 3, 2008, available at http://archives.chicagotribune.com/2008/dec/03/nation/chi-lebanon-cluster_slydec03 ("The moral stigma is going to be so powerful we think cluster bombs also will quickly become a thing of the past." (quoting Thomas Nash, coordinator of the Cluster Munitions Coalition)).

In addition, a minority view holds that the Oslo Treaty could ripen over time into customary international law, and thus be effectively binding on the United States unless persistently objected to, if a vast majority of the world community are signatories and adhere to its requirements. *See, e.g., World Conference on Cluster Munitions, supra* note 1 ("These negotiations could not come at a better time. The Oslo treaty will not only set the rules for states parties, but it will also influence the conduct of non-parties." (statement by Sen, Leahy)).

Whether the proponents of the Oslo Treaty reduce the use of cluster munitions by successfully arguing that the weapons are immoral or by making the agreement enforceable under the principles of customary international law, the United States has a significant interest in participating in the discussion.