

The Islamic State's Acquisition and Use of Chemical Weapons

Assessing the Past and Potential Threats

PART II

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This POLICY FORUM issue, a continuation of POLICY FORUM No. 2, will examine the CW attacks that the Islamic State allegedly carried out in Syria and Iraq. It will argue that there is sufficient evidence that this group has developed a rudimentary chemical weapons capability and has used sulfur mustard in Syria. This article will also contextualize the threat posed by the Islamic State's CW capability by comparing it to the threat posed by other state and non-state actors' deployment of this category of weapons. The POLICY FORUM issue will then evaluate the future threat posed by the Islamic State's use of CW in and outside the Middle East. Finally, this article briefly offers policy solutions to minimize the threat posed by this terrorist group. Definitions of all acronyms already used in Part I (POLICY FORUM No. 2) can be found there.

Assessing the Islamic State's Alleged Chemical Weapons Attacks

It is difficult to ascertain the exact number of CW attacks carried out by the Islamic State. Without a proper on-site investigation, it cannot be said for certain that a particular chemical was used in an attack. Moreover, since this actor has been conducting its operations in a war zone, it is also likely that some incidents might have gone unreported. Nonetheless, various authoritative sources have demonstrated with a high degree of certainty that this group did use chemical weapons as a part of its tactic to maximize violence and terror. Many experts have attempted to assess the utilization of this category of weapons based on open-source information. (Binder/Quigley/Tinsley, 2018: 27-28) identify 37 alleged instances in Syria and Iraq from 2014 to 2017 by researching mostly IS propaganda instruments, e.g. magazines such as *al-Naba*, *Dabiq*, and *Rumiyah*.

According to the authors, the Islamic State used two types of agents: toxic industrial chemicals and warfare agents, mostly chlorine and sulfur mustard, both of which are readily available and are not difficult to weaponize (Binder/Quigley/Tinsley, 2018: 27-29). Covering roughly the same period, *IHS Conflict Monitor* (June 29, 2017), a subsidiary of an information analytics company, using other open-source data identifies

71 alleged CW attacks carried out by IS. Other organizations such as the Syrian Network for Human Rights and the Syrian Archive have also published findings pointing to the Islamic State's routine utilization of CWs, all of which caused very few casualties.

Nevertheless, the most authoritative information on the use of chemical weapons by the Islamic State comes from the Organisation for the Prohibition of Chemical Weapons-United Nations Joint Investigative Mechanism (abbreviated hereafter to OPCW-UN JIM). The JIM's mandate was to identify as accurately as possible individuals and groups who perpetrated, organized, sponsored or otherwise facilitated CW use on the territory of Syria (OPCW-UN JIM, 2016a: 3). The JIM reviewed hundreds of alleged CW-related incidents, but compiled conclusions for only a handful of cases. According to JIM reports, the salafi-jihadi group utilized particularly sulfur mustard, in at least two cases: the attacks at Marea and Umm Hosh. The Islamic State carried out the Marea attack on August 21, 2015, by filling projectiles with a dark viscous liquid that had the characteristics of an impure form of sulfur mustard developed through the relatively uncomplicated Leinweber process (OPCW-UN JIM, 2016b: 93-97).

This report strengthens the argument that this group did not acquire CW from the regimes of Bashar al-Assad and Saddam

Hussein, but manufactured precursors itself. The projectiles filled with toxic chemicals were still intact after use, which means that they were not carrying explosives. Additionally, the symptoms developed by the victims aligned with the effects of exposure to sulfur mustard. On September 16, 2016 IS also fired mortar bombs filled with sulfur mustard at Um Hosh, a village seven km south of Marea. As in the previous case, the agent was developed through the Leinweber process, and victims showed signs of blistering, which is a symptom of exposure to sulfur mustard (OPCW-UN JIM, 2017b: 15-19). In terms of the JIM's work, it is important to note that it had a high threshold for concluding that CW were used, it was mandated only to look at cases in Syria, and its mandate was discontinued after the Russian Federation vetoed its renewal in the UN Security Council in October 2017 (UN/United Nations, October 24, 2017). Consequently, these reports prove that the group used chemical weapons, but they do not portray the whole picture on the battlefield in Syria, other instances of CW deployment in Syria and Iraq, and the attempted use of this category of weapons in attacks outside Syria.

Putting the Threat into Context

In order to assess the threat emanating from the Islamic State's CW-related in-

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tentions and capabilities, it is necessary to provide an appropriate context by making a comparison with the CW threat posed by other non-state and state actors. CBRN terrorism is not a new phenomenon: Many non-state groups have sought to acquire unconventional weapons that could be used to terrorize the general public. Salafi-jihadi groups are just one in the spectrum of entities that have actively sought these weapons. It is striking that compared to other Sunni extremist groups and other non-state actors, the Islamic State has most routinely utilized CW on the battlefield. For example, Aum Shinrikyo, the sect that released sarin in the Tokyo subway system in 1995, only conducted a total of ten CW-related incidents, while the Tamil Tigers separatist group in Sri Lanka used chlorine only once (Chapman, 2017). It is no secret that al-Qaeda and its affiliates have also attempted to gain WMD capabilities. Syria has been the site of many allegations that Jabhat al-Nusra and its successors (Jabhat Fath al-Sham and Hayat Tahrir al-Sham) have conducted CW attacks.

The JIM invited relevant actors to share information on possible CW utilization by all non-state groups, explicitly referring to the Islamic State and al-Nusra (OPCW-UN JIM, 2017a: 4). In its Seventh Report the JIM stated that it had received seven allegations that al-Nusra had filled missiles and rockets with toxic chemicals (OPCW-UN JIM, 2017b: 12). Nevertheless, the JIM did not find any instances where al-Nusra employed chemical weapons. Furthermore, many allegations were made against al-Nusra, most importantly from the Assad regime, in order to discredit it, because the prohibition of chemical weapons is an internationally accepted norm.

For many of the allegations there is no evidence that al-Nusra possessed chemical weapons or their precursors, or carried out attacks. For example, al-Nusra was alleged to have carried out the CW attacks on Talmenes on April 21, 2014, but after a detailed investigation the JIM found that the Syrian government was responsible for this incident (OPCW-UN JIM, 2016a: 43-51). Despite the allegations, there is very little evidence that al-Nusra used this category of weapons in the same routine way as the Islamic State did. Nevertheless, one

should not become complacent and conclude that al-Nusra will never contemplate developing this kind of capabilities. The group's decision not to acquire and deploy them is based on a strategic decision to gain popular support by portraying itself as a moderate organization that focuses on improving local governance. But this may change at any time.

When compared to the state-sponsored use of CW, the Islamic State's possible utilization of such weapons can be considered a low-grade threat. As of August 2018, the Syrian Network for Human Rights (August 28, 2018: 2-5) has identified 216 CW attacks carried out by the Assad regime that killed at least 1,461 people (1,397 of them civilians) and injured at least 9,753. Similarly, the Syrian Archive (2018) has identified 212 CW attacks since the start of the war in Syria until April 2018. It bases its findings on 190 different sources and 81 verified videos that corroborate the incidents. More importantly, the JIM reports attribute the majority of confirmed CW attacks to the Syrian government. In total, the JIM reported four cases where the Syrian government used CW, including at Talmenes (April, 21 2014), Sarmin (March 16, 2015), Qmenas (March 16, 2015), and, controversially, at Khan Shaykhun (April 4, 2017). At the time when its mandate was withdrawn the JIM was still analyzing several cases of CW attacks for which the Assad regime was allegedly responsible; however, because the organization ceased to exist there are no findings on these incidents. The attacks were executed by dropping barrel bombs filled with chlorine from helicopters. They were systemized and employed higher-quality precursors from Syria's CW program.

Even though the Islamic State used chemical weapons in an unprecedented way for a hybrid/non-state actor, it should be noted that in terms of lethality it remains a minor threat compared to the one posed by the Syrian regime or any other state actor. If we compare the numbers of people allegedly killed and injured by this category of weapons, the number of victims ascribed to the Syrian government is substantially higher than those associated with IS attacks. As previously mentioned, in the Islamic State's strategic thinking the main role of chemical weapons is to create



panic among its local enemies and to wage psychological warfare.

Future CBRN-related Threats

In fact, the Islamic State has not been defeated militarily, since it is estimated to have some 20,000 to 30,000 fighters in the region. What is more, IS “is reconstituting a capable insurgent force in Iraq and Syria”. It is “waging an effective campaign to reestablish durable support zones while raising funds and rebuilding command-and-control over its remnant forces” (Wallace/Cafarella, October 2, 2018). Against this backdrop, U.S. President Donald Trump’s decision at the end of 2018/early 2019 to (slowly) withdraw all 2,000 American troops from Syria was heavily criticized: Such a withdrawal would jeopardize the territorial gains against IS made by the U.S. and its coalition partners, and it could be given space to regroup (Callimachi/Schmitt, December 23, 2018).

It is highly unlikely that IS will merge or cooperate with al-Qaeda at the strategic level, because it considers itself the legitimate standard bearer of jihad (Hassan, 2018: 6). Moreover, the role played by the Islamic State will have detrimental implications in the medium term because this actor rejuvenated the salafi-jihadi movement, which had been relatively dormant prior to the Arab Spring (Schweitzer, 2017: 1-2). In terms of the threat posed by chemical weapons, Hamish de Bretton-Gordon, a CBRN terrorism expert, believes that the jihadi group will continue to acquire and utilize unconventional weapons (Cruikshank, 2018: 5-7).

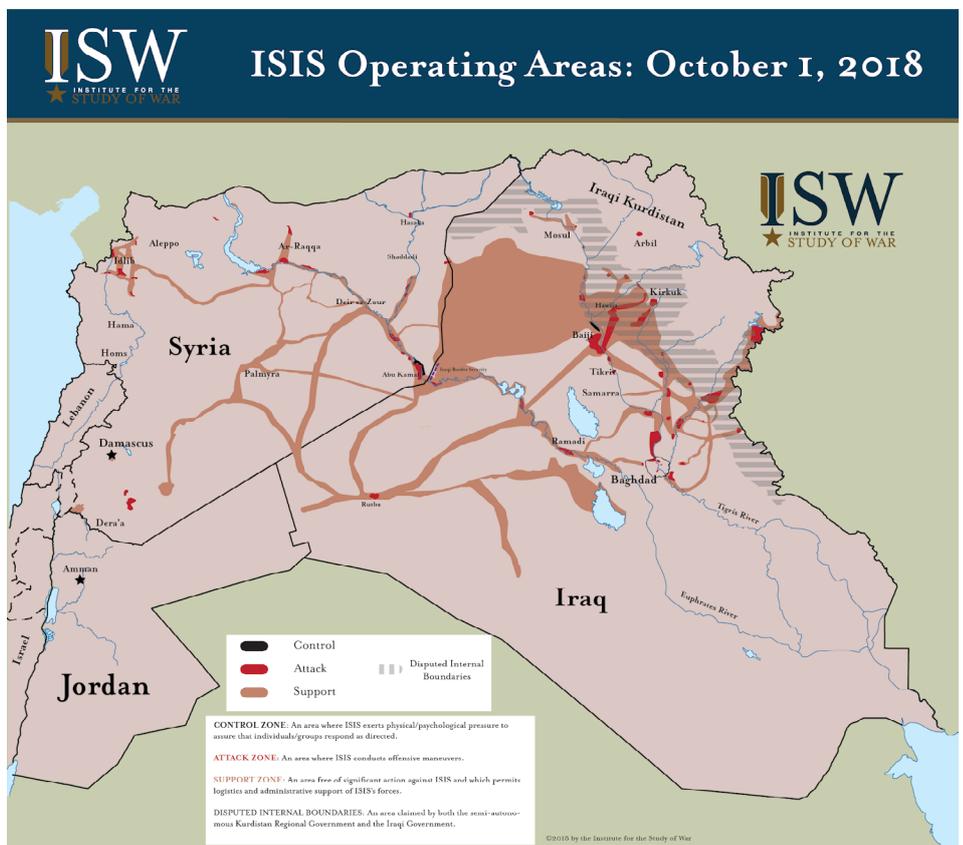
Having already developed and deployed CW, the IS leadership has enhanced its technical ability to handle this category of unconventional weapons, and, based on its experience, it can improve their tactical use. In addition to the continued threat of CW being employed in the Middle East, it is highly likely that there will be a more extensive CBRN threat in other theaters, including in Western democratic states. In two recent incidents reported in Australia and Germany, IS associates produced hydrogen sulfide and ricin, respectively (Flade, 2018: 1-3).

Conclusion: Action Still Needed

The Islamic State is an extremist group that poses a threat to all nations, both regionally and internationally. Moreover, preventing the use of CBRN weapons, particularly chemical and biological ones, constitutes an international norm that unites almost all states. Consequently, the CBRN threat posed by the Islamic State offers a unique opportunity for strengthened cooperation, coordination, and communication among regional actors in the Middle East.

Working successfully to deal with this issue will also serve as a confidence-building activity that could trigger efforts to achieve greater security cooperation in other areas. Track I and II processes should be aimed at mitigating this crucial regional and global problem by opening new avenues for more extensive operational information sharing, coordinated activities, and new opportunities for greater regional cohesion. ■

The Islamic State's Diminished Caliphate But in View of a Possible New Resurgence



Source: Wallace/Cafarella, October 2, 2018. Online available at <https://iswresearch.blogspot.com/2018/10/isiss-second-resurgence.html>.

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