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# SECURING AMMONIUM NITRATE: USING LESSONS LEARNED IN AFGHANISTAN TO PROTECT THE HOMELAND FROM IEDS

## HEARING

BEFORE THE

## SUBCOMMITTEE ON CYBERSECURITY, INFRASTRUCTURE PROTECTION, AND SECURITY TECHNOLOGIES

OF THE

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# SECURING AMMONIUM NITRATE: USING LESSONS LEARNED IN AFGHANISTAN TO PROTECT THE HOMELAND FROM IEDS

**Thursday, July 12, 2012**

U.S. HOUSE OF REPRESENTATIVES,
COMMITTEE ON HOMELAND SECURITY,
SUBCOMMITTEE ON CYBERSECURITY, INFRASTRUCTURE PROTECTION, AND SECURITY TECHNOLOGIES,
*Washington, DC.*

The subcommittee met, pursuant to call, at 10:08 a.m., in Room 311, Cannon House Office Building, Hon. Daniel E. Lungren [Chairman of the subcommittee] presiding.

Present: Representatives Lungren and Richardson.

Also present: Representative Turner.

Mr. LUNGREN. The Committee on Homeland Security Subcommittee on Cybersecurity, Infrastructure Protection, and Security Technologies will come to order.

The subcommittee is meeting today to receive testimony on the security of ammonium nitrate and the threat of IEDs to the homeland. After consultation with Ms. Clarke, the Ranking Member, and the witnesses, there is agreement that due to the sensitive nature of this topic, following the Members' opening statements, the subcommittee should recess and reconvene in a closed classified session. Specifically, both the Department of Defense and the Department of Homeland Security have indicated that disclosure of the matters to be considered here today, including the disclosure of potential domestic threats, would endanger National security.

Therefore, pursuant to House Rule XI(g)(1), I ask unanimous consent that the hearing move to a closed setting at such appropriate time.

Without objection, it is ordered.

I would now recognize myself for an opening statement.

Pursuant to agreement I have with the Minority side, if Ms. Clarke is able to get here before we move to the closed session, she would give her opening statement at that time. If she comes at the time we are going down to closed session, she would be given the opportunity to do her opening statement in the closed session, or we may have it spoken here. We will have that determined shortly.

I want to thank our witnesses for appearing today and agreeing to share with us their experience and their expertise in countering the growing threat from improvised explosive devices, otherwise known as IEDs. I also want to express my strong disappointment

that the National Protection and Programs Director to the Department of Homeland Security declined our invitation to testify.

The IED is killing our troops on the Afghan battlefield at an alarming rate. During the 2011 fighting season, 1,978 American casualties were attributed to IEDs. This year, there have been fewer IED attacks, but they have been, unfortunately, more deadly. The IED continues to be the deadly weapon of choice by insurgents in Afghanistan, responsible for 47 percent of our troop casualties and 60 percent of civilian casualties.

There was no more tragic example of the lethal consequences of an IED attack than last Sunday when six American soldiers were killed by a roadside IED in Afghanistan.

However, the IED threat is not limited to Afghanistan. It is a global threat. There are 500 IED events globally per month outside of Afghanistan. It is also being used routinely in Iraq, Colombia, Pakistan, India, and Syria. IEDs have also delivered death and destruction in our homeland, the 1993 World Trade Center truck bomb, the Oklahoma City bomb, the Times Square car bomber. It is an unsettling fact that 17 years after Oklahoma City, that type of bomb could still be made today.

The purpose of our hearing today is to review what lessons have been learned to counter this serious IED threat, what training, tactics, and techniques have been developed to combat IEDs in Afghanistan, and how those lessons can benefit our homeland defense.

I am a strong believer that the best defense against terrorist attacks, including IEDs, is good intelligence. Intelligence is always more effective when shared with the agencies responsible for our counter-IED efforts. This interagency coordination information sharing will help us provide the strongest response to the IED homeland threat.

Project Global Shield, developed by ICE and CBP is one of the efforts Director Woods will talk about today. It is a great example of a well-coordinated DHS effort to counter the IED threat. Global Shield is increasing international cooperation and collaboration on investigations into the trafficking of precursor chemicals used to manufacture explosive devices. One hundred seventy-seven world customs organization countries have now joined the effort to track illicit precursor chemicals.

This international effort has already seized 62 metric tons of precursor chemicals and made 31 arrests. When possible, attacking the IED threat at its source is clearly our best strategy.

General Barbero will describe JIEDDO, working with the CIA, FBI, and DHS, is participating in a whole-of-Government approach targeting the IED chemical supply chain. This approach includes defining a common picture of the supply chain, identifying key facilitators of raw materials in the IED pipeline, and uncovering their financial networks, institutions, and financiers. This whole-of-Government approach emphasizes the importance of interagency coordination and information sharing to more effectively counter the IED threat.

While all these programs and cooperative efforts are helpful in the counter-IED effort, they are not enough, as was demonstrated by the 500 IED events that still occur. Improving our counter-IED

effort is certainly our goal, and I look forward to the testimony of our distinguished witnesses today to describe how that can be done.

I would just mention that ammonium nitrate is mentioned in the title of our hearing today. We know it is a ubiquitous chemical. It is something we have discussed in this committee before and this subcommittee before. It is something that is properly used in the area of agriculture, and we have Members of this committee who represent districts in which that is used rather readily for appropriate purposes. The challenge we have is: How do you allow this for appropriate purposes, and at the same time, have those tools available that will allow us to interrupt the improper and lethal use of that chemical and others like it?

Now, Ms. Richardson, I would recognize you for giving the statement of the Minority.

Ms. RICHARDSON. Thank you, Mr. Chairman, for holding this hearing today, as the testimony before the subcommittee today will allow us to learn about the efforts of the Department of Defense and the collaborative interagency efforts of DHS and many other U.S. agencies to stem the cross-border flow of explosive chemicals in Afghanistan and Pakistan.

I want to thank all of our witnesses for being here and all of you for your personal experience in this issue we are about to cover today. However, my preference would have been to take testimony in public in an unclassified format. I am sure we could have asked all of our witnesses to come back and to give us a classified briefing if needed, Mr. Chairman, but I will not object to your motion to go into executive session.

General, it is good to have an opportunity to meet with you today and we look forward to welcoming you and hearing your testimony.

This subcommittee has been very active on this issue of domestic infrastructure protection and certainly on the protection of our chemical facilities, as the Chairman alluded to, from threats in illicit use of ammonium nitrate and other explosive precursors. This is something that every Member here thinks about on a daily basis, and it is our job to develop legislation to address these complicated issues.

As our Ranking Member has said many times before, we have a lot of expertise on this subcommittee and we have worked carefully with the industry and security experts to balance the needs of our farmers, our industrial users, and with very challenging complex and security issues as well.

Balancing domestic concerns in a stable, civil society that facilitates the smooth flow of commerce and supports the biological processes of our farming operations can sometimes present a more intricate challenge than might exist in other geopolitical settings.

We look forward to learning about the Department of Homeland Security's efforts to oversee how they collaborate with other agencies and countries and how that experience can inform us in developing more secure approaches to confront the threats posed by the use of explosive chemicals in our Nation.

With that, Mr. Chairman, I yield back.

Mr. LUNGREN. I thank the gentlelady for her statements. Other Members of the committee are reminded that opening statements may be submitted for the record.

I would ask unanimous consent that the gentleman from New York, Mr. Turner, a Member of the full committee, be allowed to fully participate in today's hearing.

Without objection, so ordered.

Pursuant to the previous unanimous consent, the subcommittee will recess for at least 15 minutes and no more than 30 minutes so that we can reconvene in closed session in room HVC–302. We have votes scheduled, I think, at 11:30 today, so if we could be as quick about moving over there as possible. I apologize. Votes come up. We have got to make them. We didn't have a schedule of the votes at the time we scheduled this hearing. So we will move as quickly as we can on this important subject.

[Whereupon, at 10:18 a.m., the subcommittee proceeded in closed session, and was subsequently adjourned at 11:36 a.m.]

# APPENDIX

PREPARED STATEMENT OF LIEUTENANT GENERAL MICHAEL D. BARBERO, DIRECTOR, JOINT IED DEFEAT ORGANIZATION, UNITED STATES ARMY, DEPARTMENT OF DEFENSE

JULY 12, 2012

Chairman King, Chairman Lungren, Ranking Member Clarke, and Members of the subcommittee, thank you for inviting me to speak with you today on the efforts to protect our troops from improvised explosive device (IED) attacks and share some lessons the U.S. military has learned that could be applied to the homeland.

In 2006, the Department of Defense (DoD) established the Joint Improvised Explosive Device Defeat Organization (JIEDDO) to focus on the IED threat in Iraq and Afghanistan. JIEDDO's mission is to lead the Defense Department's actions to rapidly provide counter-IED (C–IED) capabilities in support of combatant commanders through rapid acquisition, tactical operations-intelligence fusion, and pre-deployment training. JIEDDO is singularly focused on this problem and exists to rapidly field capabilities to reduce the effectiveness of this asymmetric weapon.

It is clear the IED is the primary weapon of choice for threat networks globally and is one of the enduring operational and domestic security challenges for the foreseeable future. The global proliferation of IEDs and associated technology is pervasive and continues to threaten U.S. interests at home and abroad. Since 2007, IED incidents outside of Iraq and Afghanistan have increased to more than 500 IED events per month, with Colombia having the greatest number of IED events followed by Pakistan, India, the United States, and Syria, which recently moved into the top five.[1] Since January 2011, there have been more than 10,000 global IED events occurring in 112 countries, executed by more than 40 regional and transnational threat networks.[2]

The domestic IED threat from both home-grown extremists and global threat networks is real and presents a significant security challenge for the United States and our international partners. In the early 1980s, the Provisional Irish Republican Army used ammonium nitrate-based IEDs in multiple attacks in London. The United States witnessed first-hand just how deadly ammonium nitrate can be in the 1995 Oklahoma City bombing that claimed the lives of 168 American citizens. Most recently, we saw the devastating effects in Mumbai, India, and Oslo, Norway; both attacks used ammonium nitrate as an explosive. Throughout the world these devices and the networks that use IEDs will remain a threat for decades to come.

Since the successful attacks on September 11, 2001, externally-based global threat networks have attempted numerous failed attacks such as the underwear bomb aboard Northwest Airlines fight 253 on Christmas day in 2009, the failed Times Square car bombing in 2010, and the ink cartridges packed with explosives aboard two separate cargo planes in 2010. These attempts clearly demonstrate the commitment of these threat networks to continue to employ IEDs against our homeland in traditional as well as new and creative ways. The use of advanced IED technology and sophisticated tactics, techniques, and procedures provide individuals and transnational networks with cheap and easily accessible means to achieve high-visibility effect.

The extremist networks that employ IEDs have proven to be resilient, adaptive, interconnected, and extremely violent. Globalization, the internet, and social media have extended the reach of these organizations, providing platforms for recruiting, technical exchanges, training, planning, funding, and social interaction. We see IED tactics and techniques used by insurgents increase in sophistication and proliferate globally. Wherever we see turmoil or insecurity we see the spread of these networks and the spread of IEDs.

[1] Worldwide IED Database, Institute for Defense Analysis, June 2012.
[2] Worldwide IED Database, Institute for Defense Analysis, June 2012.

Today's IEDs are relatively simple, low-tech devices, which routinely use command wire, pressure plates, or radio-controlled triggers. Many readily available components such as cell phones, agricultural fertilizers, and simple electronic transmitters and receivers have legitimate commercial uses, but are easily and increasingly adapted for illicit purposes in manufacturing IEDs. The dual-use nature of IED components poses unique challenges in our ability to regulate and limit terrorist access to IED precursors and trigger components.

Future bomb-makers will incorporate such enhancements as ultra-thin and flexible electronics; advanced communications mechanisms such as blue-tooth, Wi-Fi, and broadband; optical initiators; and highly energetic metals. In addition to more sophisticated technology, threat networks will develop enhanced IED concealment techniques and may even combine IED use with concurrent cyber attacks.

Today and in the future, U.S. forces will operate in an IED environment. While IEDs cannot stop our units or deter our commanders from taking the fight to the enemy, these devices are the greatest source of combat casualties this decade. The cumulative effects of casualties, both killed and wounded in action, inflicted on our force and magnified by insurgent information operations have made IEDs a challenge for the United States and a top priority for DoD.

To counter the IED and threat networks that employ these devices, JIEDDO focuses our activities along three lines of operation: Defeat the Device, Train the Force, and Attack the Network. To enable a successful C–IED program, these lines of operation must work in harmony.

Our first line of operation, defeating the device, is the immediate and most obvious approach to protecting our service members from IEDs. As hard as we try, we cannot stop every IED from being employed. However, once the IED finds its way to the battlefield, we have fielded a wide spectrum of initiatives to detect the components, neutralize the triggering devices, and mitigate the effects of an IED blast. DoD has developed and rapidly deployed a comprehensive portfolio of capabilities, such as mine rollers, electronic countermeasures (jammers), robotics, handheld detectors, pelvic protection garments, and aerial and ground surveillance systems, to name a few. We do not rely on just one capability. Our warfighters are provided an arsenal of tools to customize and apply to the IED threat.

Defeating the device is critical to lowering effective attacks and casualties. If we fail in this task, we could experience an unacceptable level of causalities, resulting in the loss of will and ultimately mission failure. While defeating the device is important it is not decisive. Focusing solely on defeating the device relegates us to playing defense and surrenders the initiative to the enemy.

The second area in which we focus our efforts is training. The Train the Force line of operation brings our deploying warfighters up to speed on the full range of available C–IED tools and the latest tactics, techniques, and procedures emerging from theater. A well-trained warfighter is our best C–IED weapon. A comprehensive pre-deployment training approach is required to ensure our force has adequate time to understand the integration of all aspects of the C–IED fight before deploying to theater.

The third line of operation, attack the network, is the decisive endeavor. It encompasses all the material and non-material C–IED enablers to attack the network by first identifying, and then exploiting, critical enemy network vulnerabilities. Attacking the network is the most complex line of operation, but it is how we achieve decisive results.

JIEDDO has built a deep base of knowledge in data fusion and visualization to enable operational intelligence analysis. This analysis, in turn, enables military and interagency customers to attack violent extremist networks by using more than 180 data sources and numerous Government and commercial off-the-shelf analysis tools. We have five intelligence agencies embedded within our organization to cross-train on the various tools, processes, and best practices.

The key enabler for achieving seamless sharing of information begins with applying new techniques to enhance data processing upon intake. The better we can sort or mine data, the faster our analysts can manipulate this information to produce actionable intelligence for our leaders and actionable evidence for our interagency partners. The speed at which these threat networks operate mandates our ability to produce faster analytical assessments of emerging operational environments to support rapid exploitation. This requires us to think differently and expand our community of action to share and fuse information among domestic and international partners.

Today, JIEDDO is working with an expanded community of action for C–IED that did not exist previously. We have established an interagency forum consisting of U.S. intelligence and interagency partners, Federal law enforcement, the Five Eyes (United States, United Kingdom, Canada, Australia, and New Zealand) community,

and forward-deployed forces to achieve a more transparent and broader whole-of-Government effort to disrupt threat networks employing IEDs against U.S. and Coalition forces globally.

We recognize no single Government department or international partner has the ability to fully limit access to IED precursors, so we are integrating our efforts to go after the threat networks that distribute these materials. Our U.S. Government partners bring expertise in: Defeating and prosecuting criminal networks; applying financial pressures by going after the assets of IED network members, financers, and distributors; enacting export controls and treaty compliance efforts that lead to the interdiction of IED components; advancing C–IED objectives through public diplomacy and policy and regulatory changes; advising on legitimate agricultural requirements; and coordinating and executing domestic C–IED efforts through the Department of Justice Joint Program Office. This is by no means a comprehensive list of the actions our interagency partners are applying to the C–IED fight, but it should give you an idea of the collaboration that is occurring on all levels.

To provide a couple of specific examples, the U.S. Department of Commerce added 152 persons to the Entity List because of IED-related matters. This designation stops U.S. companies from trading with these entities—companies, organizations, persons—who violated U.S. export laws. Since October 2010, the U.S. Department of Treasury has imposed economic sanctions on 33 Afghanistan-Pakistan IED facilitators. Through coordinated efforts and strong partnership across the U.S. Government and with our international partners, we are going after these nefarious actors and effectively countering the networks that use IEDs.

During the past 8 years, JIEDDO in conjunction with the military services, U.S. interagency, and our multinational partners develop a highly effective process to target extremist networks and defeat the IED. Weapons Technical Intelligence (WTI) evolved from "traditional technical intelligence"[3] and leverages law enforcement techniques as well as forensic and biometric technology to collect, exploit, and analyze IED-related materials and other weapons systems.[4] This process coordinates and integrates various DoD and Federal organizations and programs to facilitate everything from the on-site collection of IED material to the analysis of IED components in National laboratories. This analysis is then delivered to our military commanders to support targeting, track IED materials to their source, aid in host nation criminal prosecution, and enhance force protection for our Nation's warfighters.

The WTI process has proven its utility in defense of the homeland as well. An example of this is the 2011 arrest and indictment of two Iraqi nationals, Waad Ramadan Alwan and Mohanad Shareef Hammadi, on Federal terrorism charges in Bowling Green, Kentucky. The Federal Bureau of Investigation (FBI) had an ongoing counterterrorism investigation that identified the two subjects as having supported the activities of insurgents in a specific part of Iraq from 2003–2006. The Terrorist Explosive Device Analytical Center, operated by the FBI in partnership with JIEDDO and other Governmental stakeholders, supported the on-going FBI counterterrorism investigation by using biometric data collected by U.S. forces and forensic techniques to definitively link Alwan to components collected from an unsolved IED event in Iraq during that time period. This is a textbook example of how WTI enables the military to contribute to a whole-of-Government solution to a transnational threat. It further illuminates the importance of a seamless integration, U.S. forces operating outside of the United States collecting intelligence that is placed into a shared database used by law enforcement to protect the homeland.

The benefit of the WTI process has unlimited potential and applicability to defeat improvised weapon systems that provide our enemies an asymmetric advantage. Our commanders increasingly focus operations to collect biometric data, and several have referred to it as a game-changer. Biometric, forensic, and technical exploitation remove a violent extremist's greatest defense—anonymity—and makes them vulnerable to attribution. The WTI process provides a valuable framework for collecting, exploiting, analyzing, and disseminating data in a timely manner to those who need it most.

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[3] "Intelligence derived from the collection, processing, analysis, and exploitation of data and information pertaining to foreign equipment and materiel for the purposes of preventing technological surprise, assessing foreign scientific and technical capabilities, and developing countermeasures designed to neutralize an adversary's technological advantages. Also called TECHINT." Joint Publication 1–02, 15 January, 2012.

[4] WTI is "a category of intelligence and process derived from the forensic and technical exploitation of improvised explosive devices (IEDs), associated components, improvised weapons, and other weapons systems." WTI IED Lexicon, Edition 3.1, July 2011.

Emerging technologies such as stand-off biometric collection, rapid DNA processing, and real-time latent fingerprint-matching hold enormous potential to advance the WTI process into the next generation of protection. These capabilities will allow security personnel to identify threats before they reach checkpoints and to instantaneously attribute criminal and illicit activities to the perpetrators.

Moving forward, we will continue to face an ever-present threat from the overlapping consortium of threat networks employing IEDs as their weapon of choice. Mitigating the global IED threat requires a whole-of-governments approach. We must continue to synchronize C–IED and counter-threat network capabilities and actions among National, international, and other security stakeholders. These adaptive and constantly evolving threat networks require an agile and responsive counter-threat network to defeat them.

It is imperative we capture and institutionalize the lessons of a decade of combat operations. These lessons may help fill some current domestic-capability gaps which would strengthen our protection of the homeland. There is no silver bullet to defeat an emplaced IED; our best defense is a warfighter or first responder with the right intelligence, training, and equipment. Chairman King, Chairman Lungren, Ranking Member Clarke, Members of the subcommittee, again, thank you for the opportunity to appear before you today. I look forward to your questions.

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PREPARED STATEMENT OF JOHN P. WOODS, ASSISTANT DIRECTOR, HOMELAND SECURITY INVESTIGATIONS, IMMIGRATION AND CUSTOMS ENFORCEMENT, DEPARTMENT OF HOMELAND SECURITY

JULY 12, 2012

INTRODUCTION

Chairman Lungren, Ranking Member Clarke, and distinguished Members of the subcommittee: On behalf of Secretary Napolitano and Director Morton, I would like to thank you for the opportunity to testify today. Improvised explosive devices (IED) are the most prevalent form of explosive employed by terrorists around the world and the single greatest threat to coalition forces in Afghanistan. According to the 2011 annual report from the North Atlantic Treaty Organization Centre of Excellence, Defense Against Terrorism, there were a total of 4,744 global IED incidents, 6,278 deaths, and 17,040 wounds from IED incidents around the world in 2011. As I will discuss today, U.S. Immigration and Customs Enforcement (ICE) is at the forefront of the Nation's civilian efforts to disrupt, dismantle, and investigate the international movement of IED components and explosives precursors.

ICE's Homeland Security Investigations (HSI) directorate protects the Nation by investigating criminal organizations that seek to exploit weaknesses in legitimate trade, travel, and financial systems to further their illicit enterprises. HSI special agents detect, disrupt, and dismantle transnational criminal organizations (TCO) engaged in the smuggling of people, narcotics, bulk cash, weapons, and weapons-related components across our borders. HSI also has authority to investigate criminal violations of, and enforce, all U.S. export control laws related to military items, controlled "dual-use" commodities (i.e., items that have both commercial and military applications), and sanctioned or embargoed countries. Further, we have the capability to expand the scope of our investigations beyond our domestic offices to 72 international offices situated throughout the world.

PROGRAM GLOBAL SHIELD

To combat the illicit use of precursor chemicals by terrorist and other TCOs for the manufacture of IEDs, ICE initiated Program Global Shield (Global Shield) an unprecedented, multi-lateral law enforcement effort aimed at combating the illicit diversion and trafficking of precursor chemicals used in making explosives by monitoring their cross-border movements. This joint ICE and U.S. Customs and Border Protection (CBP) global project—proposed by ICE at the World Customs Organization (WCO) Enforcement Committee Meeting in Brussels, Belgium in spring of 2010—is based on collaboration among the WCO, INTERPOL, and the United Nations Office on Drugs and Crime (UNODC). This collaboration represents the first time that the threat posed by explosives precursors has been collectively addressed by the international community.

The ultimate goal of Global Shield is to identify and interdict falsely-declared precursor chemicals, initiate investigations, and uncover smuggling networks. In doing so, ICE and CBP aim to build capacity among strategic partners to detect illicit shipments of explosive precursors and promote cooperation among foreign customs

and police administrations in combating the illicit diversion of explosive precursors along the global supply chain. By working together and sharing real-time information and intelligence, countries will be able to verify the legitimacy of individual shipments while identifying, disrupting, and dismantling the terrorist networks involved in the illicit procurement of these chemicals via front companies and complicit middlemen. ICE and CBP are working closely with stakeholders from across the Federal Government, including the U.S. Departments of State (DOS) and Defense (DOD), to accomplish these goals.

The mass production of ammonium nitrate (which can be used for a variety of legitimate purposes) and other precursor chemicals occurs largely beyond the borders of countries most afflicted by IEDs. A global effort is therefore essential to effectively combat their illicit smuggling and diversion. The government of Afghanistan took a crucial first step on September 23, 2009, by banning the importation of ammonium nitrate fertilizer and issuing a decree permitting its confiscation if stored in or transported through Afghanistan. This ban quickly achieved significant results. In November 2009, Afghanistan seized 500,000 pounds of ammonium nitrate in Kandahar—one of the largest seizures of its kind in Afghanistan.

Due to the successes of Global Shield's pilot project, which commenced operations in November 2010 and concluded in April 2011, the WCO designated Global Shield as a long-term program in June 2011. In September 2011, the Bureau of International Narcotics and Law Enforcement Affairs in DOS provided $5.9 million in funding to the WCO to support and execute Global Shield over the next 3 years. This funding will support technical assistance and operational training, communications and industry outreach, and program management and quality assurance and support. To date, 79 countries and 11 international organizations participate in Global Shield. As of early June 2012, Global Shield successes include 40 enforcement actions and 41 seizures totaling 125.16 metric tons of explosives precursor chemicals.

Through Global Shield, ICE and CBP have developed a training program to develop and build capacity for foreign partners. The capacity-building program can be customized based on our partners' current abilities and legal structures. The program assists our partners in customs process development, including adoption of laws and regulations, commodity identification, IED awareness, inspection of chemical shipments, seizure of illicit shipments, investigations, and prosecution. This process not only focuses on seizing illicit shipments of precursor chemicals, but on identifying the networks responsible and dismantling or disrupting these networks. The first regional Global Shield training took place in June 2012, in Baku, Azerbaijan with nine countries participating. Additional training is being scheduled for other countries.

We believe that Global Shield provides invaluable data for trend analysis to increase the global understanding of the risk posed by precursor chemicals and their illicit movement. The program will identify best practices to combat the illicit diversion and trafficking of precursor chemicals used to manufacture explosives, as well as monitor and track legitimate shipments of precursor chemicals to assist in identifying high-risk routes for future enforcement activity. Global Shield will set the foundation for future multilateral initiatives to deny terrorists access to explosives components.

### ICE'S COUNTER-PROLIFERATION INVESTIGATION PROGRAM

ICE is at the forefront of the U.S. Government's efforts to prevent foreign adversaries from illegally obtaining U.S. military products. HSI's Counter-Proliferation Investigations (CPI) Unit targets the trafficking and/or illegal export of conventional military equipment, firearms, controlled dual-use equipment and technology, and materials used to manufacture weapons of mass destruction, including chemical, biological, radiological, and nuclear materials. HSI special agents investigate illegal exports of military equipment and dual-use items to embargoed countries, and significant financial and business transactions with proscribed countries and groups. HSI special agents provide outreach with private industry in the United States and internationally. As a capacity-building partner with the Department of State's Export Control and Related Border Security Assistance (EXBS) Program, HSI also conducts export enforcement training for foreign law enforcement and customs agencies.

The primary goal of the HSI CPI program is the detection and disruption of illegal exports and networks before any controlled items or technologies fall into the wrong hands. HSI's export enforcement program uses a three-pronged approach: Detecting illegal exports, investigating potential violations, and obtaining international cooperation to investigate leads abroad. HSI relies on specially-trained CBP officers

stationed at ports of entry to inspect suspect export shipments. Following detection of a violation, HSI special agents deployed throughout the country initiate and pursue investigations to identify, arrest, and seek prosecution of offenders of the Arms Export Control Act of 1976, the Export Administration Regulations, the International Emergency Economics Powers Act, and other related statutes and provisions.

The international nature of proliferation networks and schemes requires a global investigative response. The HSI Office of International Affairs has 72 offices around the world that work to enlist the support of their host governments to initiate new investigative leads and to develop information in support of on-going domestic investigations.

Due to the threat IEDs pose to the United States and our interests abroad, the HSI CPI Unit established a specialized program to initiate investigations and share law enforcement intelligence information concerning the illicit movement of IED components and precursor chemicals. To this end, HSI partnered with CBP, the DHS National Protection and Programs Directorate's Office of Bombing Prevention, and DOS and DOD (specifically with the Joint Improvised Explosive Device Defeat Organization (JIEDDO)). As part of HSI's own counter-IED strategy, these partners are currently working with our colleagues in CBP to schedule additional investigative and interdiction training for customs and law enforcement officials in Afghanistan and Pakistan. In December 2010, HSI provided training for approximately 100 customs officials from these countries.

HSI's collaboration with JIEDDO's homemade explosives working group has led to a better understanding of how transnational criminal networks are exploiting the global supply chain to illegally move IED precursor chemicals. Additionally, HSI's Attaché office in Kabul, Afghanistan worked with JIEDDO elements in country to identify networks smuggling IED precursor chemicals from Pakistan into Afghanistan.

HSI also worked with the DOS during the U.S.-Pakistan Strategic Dialogue relating to IEDs and controls of IED components and precursor chemicals. These partnerships are leading to a more holistic approach, allowing agencies to identify the most effective method to disrupt the criminal and terrorist networks procuring and using IEDs.

PROJECT SHIELD AMERICA (PSA)

One of the most effective tools HSI special agents use as part of HSI's larger counter-proliferation strategy is our industry outreach program, Project Shield America (PSA). Through this program, HSI special agents conduct outreach to manufacturers and exporters of strategic commodities to educate them on U.S. export control laws, discuss export licensing issues and requirements, teach them how to identify "red flag" indicators used in illegal procurement, and explain which Government agencies are responsible for the licensing of different categories of export-controlled commodities and technology. By the end of 2011, HSI special agents had delivered over 20,000 outreach presentations to private industry and other entities as part of the PSA program.

EXPORT ENFORCEMENT COORDINATION CENTER (E2C2)

A part of the President's Export Control Reform Initiative is to improve law enforcement coordination to investigate violations of U.S. export control laws. In November 2010, President Obama signed an Executive Order creating the Export Enforcement Coordination Center (E2C2)—a multi-agency center housed within HSI that serves as the primary Government forum for the exchange of information and intelligence related to export enforcement. Operational since April of this year, the E2C2, which is managed and operated by ICE, enhances the United States' ability to combat illicit proliferation by working to coordinate investigative and enforcement activities related to export control.

The E2C2 is staffed with full-time personnel from HSI, as well as individuals detailed from other departments and agencies including the U.S. Departments of State, Treasury, Defense, Justice, Commerce, and Energy; the Office of the Director of National Intelligence; and other Executive branch departments, agencies, or offices as designated by the President. Specifically, the functions of the E2C2 include:

- Coordinating the de-confliction of criminal and administrative enforcement actions, and resolving conflicts among partner agencies that have not been otherwise resolved in the field;
- Serving as a primary point of contact between enforcement authorities and agencies engaged in export licensing;

- Coordinating law enforcement public outreach activities related to U.S. export controls; and
- Establishing Government-wide statistical tracking capabilities for U.S. export enforcement activities.

The E2C2 replaced HSI's National Export Enforcement Coordination Network (NEECN), which led coordination among DHS components to address challenges inherent in dismantling transnational procurement networks. Unlike the NEECN, the Executive Order requires E2C2 participation by law enforcement and the intelligence community.

CONCLUSION

HSI special agents are working hard to ensure that IED components and precursors do not reach the wrong hands, and to prosecute those who subvert the rule of law and threaten our National security. Furthermore, HSI is coordinating our efforts with other U.S. and foreign governments to enhance our and other agencies to counter IED abilities. We look forward to continuing to work with this subcommittee on this critical National security issue.

Thank you once again for the opportunity to appear before you today. I would now be pleased to answer any questions you have.

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PREPARED STATEMENT OF CHARLES MICHAEL JOHNSON, JR., DIRECTOR, INTERNATIONAL COUNTERTERRORISM & SECURITY ASSISTANCE ISSUES, GOVERNEMENT ACCOUNTABILITY OFFICE

THURSDAY, JULY 12, 2012

COUNTERTERRORISM.—U.S. AGENCIES FACE CHALLENGES COUNTERING THE USE OF IMPROVISED EXPLOSIVE DEVICES IN THE AFGHANISTAN/PAKISTAN REGION

GAO–12–907T

Chairman Lungren, Ranking Member Clarke, and Members of the subcommittee: I am pleased to be here to discuss the collaborative efforts of U.S. agencies to detect and prevent the smuggling into Afghanistan of calcium ammonium nitrate (CAN) fertilizer produced in Pakistan. Approximately 80 percent of the improvised explosive devices (IEDs) in Afghanistan contain homemade explosives, primarily CAN smuggled from Pakistan. These IEDs have been a major source of fatalities among U.S. troops in Afghanistan and have been used by various insurgent groups in Pakistan to kill thousands of Pakistani civilians and members of Pakistani security forces. U.S. officials recognize the threat posed by the smuggling of CAN and other IED precursors from Pakistan into Afghanistan, and various U.S. departments, including the Department of Homeland Security (DHS), are assisting Pakistan's government in countering this threat. My remarks today are based on our May 2012 report on this issue.[1]

According to the Department of Defense (DOD), CAN is produced in Pakistan at two factories. DOD estimates that about 240 tons of CAN—representing less than one-tenth of 1 percent of the two factories' total annual production capacity—is used by insurgents to make IEDs for use in Afghanistan. When processed and mixed with fuel oil, CAN fertilizer becomes a powerful homemade explosive. DOD officials noted that only a small amount of CAN is required to make powerful IEDs. According to DOD, a 110-pound bag of CAN yields about 82 pounds of bomb-ready explosive material. This small quantity has the capacity to destroy an armored vehicle or detonate 10 small blasts aimed at U.S. forces conducting foot patrols.

Afghanistan outlawed CAN in 2010, but because of demand for CAN as fertilizer and for IEDs, smugglers bring it into the country, for example, on trucks hidden under other goods. Afghanistan and Pakistan face challenges similar to those that the United States and Mexico face in trying to prevent smuggling across sections of our shared border. U.S. officials note that Pakistan maintains two primary border crossings along the approximately 1,500-mile border with Afghanistan, and only a small percentage of the trucks crossing the border are inspected. Our May 2012 report contains a video of activity at border crossings along the Afghanistan-Pakistan border.

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[1] GAO, *Combating Terrorism: State Should Enhance Its Performance Measures for Assessing Efforts in Pakistan to Counter Improvised Explosive Devices,* GAO–12–614 (Washington, DC: May 15, 2012).

Our May 2012 report: (1) Described the status of U.S. efforts to assist Pakistan in countering IEDs, and (2) reviewed the Department of State's (State) tracking of U.S.-assisted efforts in Pakistan to counter IEDs. To describe these efforts, we reviewed documentation from multiple U.S. agencies—including DHS, State, the Department of Defense (DOD), and the Department of Justice—to inventory and describe their relevant activities and performance measures. We also interviewed representatives of U.S. agencies and international partners in the United States and Pakistan.[2]

In summary, we identified four categories of assistance U.S. agencies have provided: (1) Counter-IED training and equipment, (2) a counter-IED public awareness campaign, (3) training of border officials, and (4) legal assistance for laws and regulations to counter IEDs and IED precursors. We found that each agency providing counter-IED assistance to Pakistan performs a unique role based on its specialized knowledge and expertise. DHS, for example, takes primary responsibility for border management and customs investigation training. DHS conducts joint regional training and operational exercises for both Pakistani and Afghan border officials, including international border interdiction training and cross-border financial investigation training. DHS also plays a lead role in Program Global Shield to foster cross-border cooperation and initiate complementary border management and customs operations.[3] According to DHS, the main goals of Program Global Shield are: (1) To identify and interdict falsely declared explosive precursor chemicals, (2) to initiate investigations of smuggled or illegally diverted IED materials, and (3) to uncover smuggling and procurement networks that foster illicit trade.

According to agency officials, U.S. agencies work through various organizations to coordinate and share information related to assisting Pakistan with counter-IED efforts. These include the following:

- The U.S. Embassy-Pakistan Counter-IED Working Group helps to keep counter-IED efforts a priority. Coordinated by State, the group also includes participants from DHS, DOD, and the Departments of Justice and Agriculture as well as the U.S. Agency for International Development, the British High Commission, and the United Nations Office of Drugs and Crime.
- The Joint Improvised Explosive Device Defeat Organization (JIEDDO)[4] leads DOD's counter-IED efforts by providing intelligence and expertise on IEDs. For example, JIEDDO hosted a global conference on homemade explosives in fall 2011 that was attended by fertilizer producers and representatives from several agencies. JIEDDO conducted several studies and provided technical assistance to fertilizer producers on how they could mark the product to help inhibit smuggling.
- The Office of the Special Representative for Afghanistan and Pakistan participates in regular discussions on counter-IED issues with Central Command (CENTCOM), Special Operations Command (SOCOM), JIEDDO, and the Counter-IED Working Group at the U.S. Embassy in Pakistan, which includes DHS.

In providing assistance to Pakistan, which adopted a counter-IED strategy in 2011, U.S. agencies have encountered a range of challenges. U.S. officials in Washington, DC, and Islamabad, Pakistan identified the following key difficulties that hamper the provision of training and equipment.

- *Obtaining visas for U.S. officials.*—We have previously reported that U.S. officials face delays in obtaining visas to travel to Pakistan.[5] During our January 2012 meetings at the U.S. Embassy, officials from several agencies told us that it is difficult to obtain visas for U.S. officials, including trainers, to travel to Pakistan. According to officials, visa renewals sometimes take up to 6 weeks,

[2] More detail on our scope and methodology is available in the issued report. We conducted this performance audit from October 2011 to May 2012 in accordance with generally accepted Government auditing standards. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objectives.

[3] Program Global Shield is an international effort to counter the smuggling of chemical precursors that could be used to manufacture IEDs, including CAN. The World Customs Organization, the United Nations Office on Drugs and Crime, Interpol, and DHS jointly initiated this project in 2010 and established it as a program in June 2011 with funding of about $5.9 million that State provided through its Bureau of International Narcotics and Law Enforcement Affairs, according to the Bureau's Global Shield liaison officer.

[4] JIEDDO is an agency of DOD.

[5] GAO, *Accountability for U.S. Equipment Provided to Pakistani Security Forces in the Western Frontier Needs to Be Improved,* GAO–11–156R (Washington, DC: Feb. 15, 2011).

which can force trainers to leave the country until they get their visa renewed. This has sometimes resulted in disruptions and cancelled training courses.

- *Vetting Pakistani officials to receive U.S. training*.—U.S. law requires that U.S. agencies determine whether there is credible evidence of gross violations of human rights by security force units or individuals slated to receive security assistance.[6] According to U.S. officials, Pakistan must provide in advance the names of individuals who will be receiving U.S. training in order for them to be vetted. In addition U.S. officials stated that Pakistan has not always been timely in releasing the names of officials who are to receive the training, which can create logistics and scheduling difficulties. For example, according to DHS officials, lack of sufficient time to complete the vetting process resulted in the cancellation of a Program Global Shield training session in October 2011.
- *Ensuring timely delivery of equipment*.—Problems clearing customs and other issues have delayed the transfer of counter-IED equipment from the United States to Pakistani forces. For example, as of April 2012, of the 110 IED jammers that DOD procured in 2009 for Pakistan at a cost of about $22.8 million, 55 jammers were still in Karachi awaiting release from Pakistani customs. The remaining 55 jammers were being kept in storage in the United States until the initial 55 were released.
- *Reaching agreement on the specifics of U.S. assistance projects*.—Efforts by the United States to reach agreement with Pakistan on the specific terms of assistance projects can be challenging. For example, the United States and Pakistan planned to establish a facility capable of exploiting chemical, technical, biometric, and documentary evidence to enable Pakistan to disrupt insurgent networks. According to DOD officials, once it became clear that the United States and Pakistan could not reach agreement on joint use of the facility, DOD terminated its support for establishing this facility.

In addition to these challenges to U.S. efforts to assist Pakistan, U.S. officials identified several broader challenges to Pakistan's ability to counter IEDs and, more specifically, to suppress the smuggling of CAN and other IED precursors across the Pakistani border with Afghanistan.

- *History of smuggling across the Pakistan-Afghanistan border*.—Segments of the Afghanistan-Pakistan border remain porous and are difficult to patrol. The border between Pakistan and Afghanistan is approximately 1,500 miles long and much of the terrain along the central and northern border is rugged and mountainous. There is a history of smuggling goods in both directions at many points along this porous border.
- *Availability of CAN substitutes for IEDs*.—Even if the smuggling of CAN could be suppressed, insurgents can readily use another precursor chemical to make IEDs. According to DOD, other products available in Pakistan—such as potassium chlorate, used in making matches, and urea, another commonly used fertilizer—can also be used to produce IEDs. At a JIEDDO conference on homemade explosives, a panel of experts agreed that insurgents could easily substitute these commodities to make IEDs if it becomes more difficult for them to access CAN.
- *Smuggling of IED precursors into Afghanistan from other bordering countries*.—While Pakistan is the principal source of CAN coming into Afghanistan, China and Iran are also reported to be suppliers of IED precursor chemicals. According to State officials, other substitutes for CAN, including potassium chlorate and urea, are exported by countries other than Pakistan.
- *Delay in finalizing Pakistan's National Counter-IED Implementation Plan*.—Pakistan's Directorate General for Civil Defense has developed a National Counter-IED Implementation Plan as outlined in the National Counter-IED Strategy. However, as of April 2012, the plan had not been approved due to concerns over resourcing and other issues.

Our May 2012 report also found that U.S. agencies have developed a new performance indicator and three targets to track some U.S.-assisted Pakistani counter-IED efforts. Specifically, State's fiscal year 2013 Mission Strategic and Resource Plan—which is designed to reflect U.S. priorities in Pakistan—included a performance indicator to monitor Pakistan's implementation of effective measures to prevent illicit commerce in sensitive materials, including chemical precursors used to make IEDs in Afghanistan. To measure progress toward this performance indicator, the plan included three targets: (1) Implementation of the Afghanistan-Pakistan

[6] See 22 U.S.C. 2378d regarding assistance furnished under the Foreign Assistance Act or the Arms Export Control Act. For programs funded by DOD appropriations, the provision is limited to training programs and is incorporated annually in the Department of Defense Appropriations Act. See, for example, Pub. L. No. 112–10, Div. A. sec. 8058.

Transit Trade Agreement for fiscal year 2011, (2) improved competency of Pakistani customs and border officials and improved monitoring at border stations for fiscal year 2012, and (3) Pakistan's implementation of a real-time truck-tracking system for fiscal year 2013.

While the inclusion of a counter-IED performance indicator and targets to measure progress toward the indicator in the fiscal year 2013 MSRP is a positive step, it does not reflect the broad range of U.S.-assisted counter-IED efforts in Pakistan. As a result, our report included a recommendation to State to enhance its counter-IED performance measures to cover the full range of U.S.-assisted efforts. State concurred with our recommendation and noted that comprehensive metrics would better enable evaluation of progress in counter-IED efforts in Pakistan. State committed to improve assessment of its programs by looking for ways to broaden the scope of existing metrics in order to better reflect and evaluate interagency participation in counter-IED efforts. In its comments on a draft of our report, DHS noted that it is committed to working with interagency partners to improve capacity for tracking counter-IED efforts in Pakistan.

Chairman Lungren, Ranking Member Clarke, and Members of the subcommittee, this concludes my statement. I would be happy to answer any questions you may have at this time.