THE CENTER FOR ARMS CONTROL AND NON-PROLIFERATION

Nuclear Terrorism: A Clear and Present Danger

Introduction

Nuclear terrorism – the threat by a terrorist group to obtain and use a nuclear weapon, or to acquire enough nuclear material to create and use a crude weapon or dirty bomb – poses a serious threat to the United States and its allies. A Pentagon review of U.S. nuclear policy indicated that nuclear terrorism is the "most immediate and extreme danger" facing the United States. With just 25 kilograms worth of highly enriched uranium (HEU), small enough to fit in a suitcase, terrorists could make a nuclear weapon capable of inflicting the same devastation as the bombs used at Hiroshima and Nagasaki.

Terrorists could also lace conventional explosives with radiological material to create a dirty bomb. A dirty bomb, while not as lethal as a nuclear weapon, is considered a weapon of mass *disruption* due to the widespread panic associated with the weapon's radiological fallout. According to a 2011 Congressional Research report, a dirty bomb detonation would have six major consequences: immediate casualties from conventional detonation, panic, economic disruption, long-term evacuations, exorbitant decontamination costs, and long-term casualties from cancer.

What Can Be Done?

To address these threats, the United States and Russia, the two countries with the largest stockpiles of nuclear material, have worked together to secure nuclear weapons and facilities. These programs have also been extended to other countries with nuclear facilities and materials that could be at risk.

There has been considerable progress over the last several decades to reduce the probability that terrorists might acquire nuclear material. These efforts include the complete removal of civilian highly enriched uranium from 30 countries and Taiwan and the conversion or closure of at least 94 research reactors that formerly used highly enriched materials.

But there is still significant work to be done. There remains nearly 2,000 metric tons of weapons-usable nuclear material spread across the globe, some of it vulnerable to theft or sabotage. There are abundant examples of lax security standards, including the break-in at the U.S. maximum security facility for nuclear materials led by an unarmed 82-year old nun, an armed break-in at a South African nuclear facility in 2007, and at least 514 cases in the last 3 years in which nuclear or radiological material was lost, stolen, or outside of authorized control.

Unfortunately, the programs tasked with securing these materials have steadily declined in attention and funding. Congressional appropriations for core nuclear security programs have fallen from $1.97 billion in 2013 to a requested $1.27 billion for 2017. According to Sen. Dianne Feinstein (D- Calif.), the funding reduction has led to a five-year delay for securing and converting nuclear reactors across the globe, pushing the completion of that project to 2035, nearly 20 years away.

	FY 2013 Enacted	FY 2014 Enacted	FY 2015 Enacted	FY 2016 Enacted	FY 2017 Request
Core Defense Nuclear Non-proliferation Programs	$2 Billion	$1.5 Billion	$1.3 Billion	$1.4 Billion	$1.3 Billion

To prevent a nuclear terrorism incident, the United States and its international partners must secure radiological and fissile material with the goal of maintaining the highest security standards. Nuclear non-proliferation programs should receive full funding and support from both Congress and the White House.

Learn more about nuclear non-proliferation by visiting www.armscontrolcenter.org.