

MEMORANDUM OF UNDERSTANDING
BETWEEN
THE DEPARTMENT OF ENERGY OF THE UNITED STATES OF AMERICA
AND
THE MINISTRY OF MINES AND ENERGY OF THE REPUBLIC OF COLOMBIA
CONCERNING COOPERATION TO PROTECT
RADIOACTIVE MATERIAL

The Department of Energy (DOE) of the United States of America and the Ministry of Mines and Energy (MME) of the Republic of Colombia, hereinafter referred to as the "Participants":

GUIDED by their mutual desire to prevent potential terrorist acquisition and use of weapons-usable radioactive materials, through technical and methodological cooperation, including the installation or improvement of physical protection systems to secure these materials at storage and operational facilities in Colombia; and

CONSIDERING the ongoing exigency of complementary efforts to help prevent the theft of and unauthorized access to high-activity radioactive materials that could be used to construct a radiological dispersal device, which would have profound social and economic consequences were such a weapon to be used in a terrorist attack anywhere in the world,

Have reached the following understanding:

I. SCOPE OF COOPERATION

1. DOE, through its National Nuclear Security Administration, may provide technical assistance to governmental storage and operational facilities in Colombia jointly selected by DOE and MME (hereinafter "Facilities"), in the form of equipment and materials, as well as training and services, for use to secure radioactive material at those Facilities. As used herein, "radioactive material" includes, but is not limited to, radioactive sources suitable for use in radiological dispersal devices ("dirty bombs").
2. Each Participant may, following written notification sent to the other Participant, delegate its responsibilities for the implementation of this Memorandum of Understanding (MOU) to other ministries or agencies of its government.
3. Planned cooperative activities under this MOU include the following:
 - a. Joint identification by DOE and MME of Facilities that use or store Category I, II, and III radioactive sources;
 - b. Joint selection by DOE and MME of Facilities which should receive security equipment (including, but not limited to, motion detectors, cameras, off-site monitoring, hardened steel doors, high-security locks, and balanced magnetic switches), and training of personnel at those Facilities to enhance the security of radioactive materials located at said Facilities;
 - c. DOE's installation and, as necessary, the maintenance and repair of the security equipment for an initial period of three years once installation of said equipment is completed, to maintain the operating capability of DOE-supplied equipment;
 - d. DOE's setup, testing, user-training, and establishment of procedures for Facility staff at selected Facilities where DOE-provided security equipment is installed;
 - e. DOE's monitoring of the progress of work conducted at Facilities to ensure timely completion of installation of the equipment and that appropriate training has taken place for users of the equipment;
 - f. the Participants' conduct, as appropriate, of subsequent routine visits to Facilities to verify that the security systems are functioning properly and to ensure that the security system remains operational for the long-term;

- g. the Participants' joint efforts to sustain the DOE-provided security systems, to enhance national and local (facility) infrastructure, through advising, training and technical assistance, which may include, but is not limited to:
 - i. Strengthening MME's regulations for maintaining the security of radioactive materials;
 - ii. Establishing an inspection program to enforce regulations;
 - iii. Developing a national response plan for security alarm incidents;
 - iv. Training Colombian national or local institutions or agencies responsible for making or coordinating response to security alarm activation, including first responders;
 - v. Developing security procedures and training facility staff personnel to implement said procedures; and
 - h. MME's conduct of periodic (e.g., quarterly) inspection visits of Facilities where DOE-supplied security systems are installed, as complemented by maintenance visits by a DOE contractor, to ensure that Facilities which receive DOE-supplied security equipment continue to use and maintain said equipment in good working order at all times during which radioactive materials remain in use or in storage at said Facilities.
- 4. DOE and MME may conduct technical workshops, consultations, site surveys, verification inspections, and acceptance testing of materials and installed equipment. Joint working groups of technical experts may be formed to exchange technical information and to make proposals on technical and training matters to ensure the effective implementation of this MOU.
- 5. The terms of any technical assistance provided under this MOU are expected to be set forth in contracts or other written arrangements concluded between DOE or its designated implementing agents and the Facilities. Those written arrangements are to satisfy all legal and policy requirements applicable to DOE's provision of free technical assistance funded by the United States Government.

II. GENERAL CONSIDERATIONS

1. This MOU does not constitute a legally binding agreement.
2. All activities to be conducted by each Participant and its implementing agents under this MOU should be carried out in accordance with the laws of that Participant's Government and with applicable international agreements to which that Participant's Government is party.

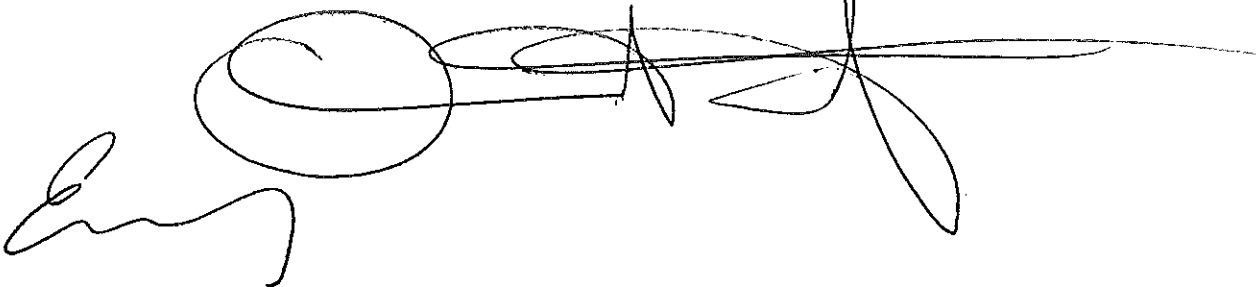
III. IMPLEMENTATION, MODIFICATION, AND DURATION

1. Implementation of this MOU is to begin upon signature by both Participants and continue for 3 years.
2. This MOU may be extended for additional periods by the Participants' mutual written consent.
3. This MOU may be modified in writing at any time by the Participants' mutual consent. Modifications are to be operative upon signature by both Participants.
4. The Participants may discontinue participation in this MOU at any time by mutual consent in writing. Alternatively, if either Participant wishes to discontinue its participation in this MOU, it should endeavor to provide at least 90 days advance written notice to the other Participant.

Signed, in duplicate, at Bogota on the 08 day of October 2013 and at Washington on the 31 day of October 2013, in the English and Spanish languages.

FOR THE DEPARTMENT OF ENERGY OF
THE UNITED STATES OF AMERICA:

FOR THE MINISTRY OF MINES AND
ENERGY OF THE REPUBLIC OF
COLOMBIA:

The image shows two handwritten signatures. The signature on the left is for the Department of Energy of the United States, and the signature on the right is for the Ministry of Mines and Energy of the Republic of Colombia. Both signatures are written in black ink and are somewhat stylized.