

## **Dominican Republic**

IAEA Member State since July 1957



# Key achievements in the Dominican Republic

- 2018: The first public sector diagnostic imaging centre for non-communicable diseases is established at the Rosa Emilia Sánchez Pérez de Tavares National Cancer Institute in Santo Domingo.
- 2017: Areas using the sterile insect technique to eradicate the Mediterranean fruit fly produce higher quality crops helping improve their export.
- 2016: A central storage facility for disused radioactive sources is established in Sierra Prieta.

## Atoms for peace and development

Widely known as the world's 'Atoms for Peace and Development' organization within the United Nations family, the IAEA is the international centre for cooperation in the nuclear field. The Agency works with its Member States and multiple partners worldwide to promote the safe, secure and peaceful use of nuclear technologies.

The IAEA's technical cooperation (TC) programme helps countries to use nuclear science and technology to address key development priorities in areas including health, agriculture, water, the environment and industry. The programme also helps countries to identify and meet future energy needs. It supports greater radiation safety and nuclear security, and provides legislative assistance.



Under a regional IAEA project, the Dominican Republic built its capacities in the mutation breeding of rice and banana crops. This knowledge will be used to develop new highly productive varieties, which are resistant to diseases and fungal infestations. (Photo: N Schloegl/IAEA)

## Recent project successes

#### Human health and nutrition

From 2016 to 2017, the IAEA supported a national study by the Ministry of Health and the Autonomous University of Santo Domingo, under the framework of a national nutrition programme organized by the Vice Presidency of the Dominican Republic and the UN World Food Programme (WFP).

This national programme developed two types of micronutrient-fortified foods to strengthen the immune system of the country's vulnerable people and help combat iron deficiency and anaemia. *Progresina* is made from a mixture of corn and soy fortified with 21 vitamins and minerals; *Chispitas Solidarias* contains 15 vitamins and minerals, and is specifically designed for young children from six months to five years old.

The IAEA supported investigations of the food's effectiveness and benefits on iron levels, healthy body composition and growth of children from two to six years old. Additional financial and technical support was provided for fellowships, training, expert visits, and the procurement of laboratory equipment and consumables. The study showed that the fortified foods are effective in combatting anaemia and undernutrition. As a result, the Dominican Republic decided to continue supporting the supplementation programme to further address dietary deficiencies and malnutrition throughout the country.

#### Food and agriculture

With IAEA support, the Autonomous University of Santo Domingo received an environmental monitoring station and regional training to help analyse the productivity of their crops. The monitoring station was installed at the University's farmland in Boca de Mao and is used to assess how the supply of water and environmental conditions affect crop yields. The data collected will be used to research soil and environmental factors to understand the effects of climate change on local crop productivity, and help small-holder farmers to adapt.

#### Water and the environment

The careful management of water resources is particularly important in the southern region of Azua, which is heavily reliant on agriculture for its income. The IAEA therefore helped support a National Geological Survey to analyse the quality of the region's water.



Researchers skills were enhanced in using hydrogeology and isotopic hydrology to determine water quality and identify possible sources of contamination. The resulting data is supporting policy decisions for better quality and more sustainable management of water resources. The results were also presented at the 46th Congress of International Association of Hydrogeologists, organized in cooperation with the IAEA in Malaga, Spain.

## Active national projects

- Building and Strengthening the National Capacities and Providing General Support in Nuclear Science and Technology (DOM0006)
- Strengthening National Capabilities to Ensure Food Authenticity (DOM5005)
- Enhancing the Management of Patients with Oncological, Cardiovascular and Neurological Diseases (DOM6011)
- Issuing a Regulation for the Control of Marine Contamination in the Southern Coast Region (DOM7005)
- Strengthening National Infrastructure for Radiological Protection and Safety (DOM9005)
- Strengthening the National Infrastructure for Radiation Safety (DOM9006)

The Dominican Republic also participates in 46 regional and 3 interregional projects, mostly in the area of food and agriculture.

# Previous IAEA support to the Dominican Republic

Recent IAEA support concentrated on establishing analytical capacities for monitoring contaminants in the environment, and strengthening the regulatory authority to maximize the benefits and minimize potential risks in the use of nuclear science and technology.



The IAEA continues to support staff training at the Dominican Republic's first cyclotron-PET/CT centre, located at the public cancer hospital in Santo Domingo (INCART). These efforts will strengthen safe, high quality nuclear medicine services in the country. (Photo: N Schloegl/IAEA)

IAEA support to the Dominican Republic, 2009–2019

trained (including 113 women)

international experts provided attended specialist meetings (including 25 women)

### **Priority areas of support**

- Strengthening regulatory infrastructure for radiation safety and nuclear security
- Developing human resources for the utilisation of radiation technology
- Improving the food and agriculture sector
- Enhancing environmental protection
- Supporting human health and nutrition
- Improving the management of water resources
- Facilitating energy planning

The Dominican Republic's contribution to South-South and triangular cooperation, 2009–2019

training courses hosted

26

expert and lecturer assignments provided by the Dominican Republic

Based on data available as of April 2020

## Cancer control imPACT Review conducted: October 2008

### Strategic documents supported

- United Nations Development Assistance Framework (2018–2022)
- Country Programme Framework 2020–2025 (to be signed in 2020)

### www.iaea.org/technicalcooperation

The IAEA collaborates with National Liaison Officers and Permanent Missions to deliver its TC programme.