



Information on PAHO/WHO Collaborating
National Reference Laboratories in the
Americas That Work with Dengue

Caribbean Epidemiology Centre (CAREC)



Photo of the Institution



Institutional Staff



Director

Dr. Glenda Maynard

Mailing address, telephones, and fax of the Institution.

16-18 Jamaica Boulevard, Federation Park. Port Of Spain. Trinidad and Tobago, West Indies (WI)

Telephone: (+1-868) 622-4262

E-mail or other contact information.

salasros@carec.paho.org

Web page link to your Institution.

<http://www.carec.org>

Brief Historical Outline of the Origins/Foundation of the Institution

The Caribbean Epidemiology Centre is the public health agency in the Caribbean Region. Since 1975 it has been administered by the Pan-American Health organization (PAHO/WHO) on behalf of 21 countries.

- **Vision:** CAREC, a public health information service and consulting organization, dedicated to being the best at providing the information and specialized support services people need to promote health and prevent disease in the Caribbean.
- **Mission:** To improve the health status of Caribbean people by improving country capacity in epidemiology, laboratory and related public health disciplines through programmers of service training and technical cooperation and through a well trained and motivated staff.

Functions

Among others:

1. To serve as a specialized technical resource of Caribbean Cooperation in health (CCH) to assist advice and cooperate with Members in the surveillance, prevention and control of non-communicable as well as communicable diseases.
2. To act as a Centre for epidemiological and statistical analysis, including situational analysis and trends assessment for all countries in the Caribbean
3. To assist, advice and cooperate with the Member on attainment of the level of national epidemiological and laboratory capacity necessary for defining health sector priorities, designing effective interventions and evaluating performance.
4. To provide reference and referral laboratory services in microbiology, immunology and medical entomology in support to national, CCH and regional programmes.
5. To maintain facilities for the investigation of selected human and animal diseases and health problems of public health importance.
6. to asses new laboratory procedures, provide advisory services on their suitability and maintain test panels to facilitate assessment
7. To provide training in epidemiology, laboratory technology and related public health disciplines.
8. To undertake and collaborate in applied and operational research on health and diseases problems of importance.
9. To collaborate with all Caribbean and other regional international institutions and with non-governmental and private sector working in related fields.

Activities developed in 2005-2006

The following information highlight some of the Centre's achievements during 2005 as an example of the Direct Technical Cooperation, Surveillance and Response to CAREC's Member Countries (CMCs).

National surveillance capacity was strengthened in the CMCs through in-country workshops to develop operational manuals for communicable disease surveillance and to introduce and train staff involved in their national surveillance systems as well as the revised regional system.

Mortality surveillance was strengthened and 24 country-years of validated mortality data from 13 countries were forwarded to PAHO, Washington.

The laboratories continued to provide diagnostic and reference support to the priority prevention and control programmes of the Caribbean Commission of Health (CCH). This included anti-microbial resistance testing for enteric organisms, gonorrhoeae, *S. pneumoniae*, tuberculosis, and insecticide resistance testing supporting cost effective national vector control programmes. Viral load testing was scaled up at CAREC; to support programmes of monitoring antiretroviral therapy and prevention of mother to child transmission (PMTCT). The proficiency testing programme to CMC laboratories was expanded, with the support of the EU/CARIFORUM Medlabs strengthening project and a plan for a Caribbean external quality assurance scheme developed, which will be coordinated by CAREC.

During 2005, 14 outbreaks were reported from 11 CMCs and technical assistance and/or laboratory support was provided in most instances. Nine were outbreaks of food poisoning or gastroenteritis with >350 cases reported from hotels, restaurants, a day care centre, prison, a private hospital and a government dinner. Identified agents were: *Salmonella*, *Shigella*, Norovirus and Rotavirus. Implicated food sources included egg dishes, seafood, fried rice and BBQ chicken. Investigations showed the

continued importance of eggs (e.g., pooled or undercooked) as an *S. enteritidis* source in Caribbean outbreaks, especially in hotels. The other four outbreaks were a hospital acquired outbreak, two community-acquired leptospirosis outbreaks following flooding, and two dengue outbreaks in Suriname and Belize.

Support for facilitating the implementation of organized programmes for cervical cancer prevention and control in CMCs continued with technical assistance provided for the development of Strategic Plans for Cervical Cancer Prevention and Control in the sub-region.

Training and human resource development in country and regionally continued as part of the Centre's core misión e.g. the Epidemiology Division conducted two mortality coding workshops to enhance skills of 31 mortality coders, statistical officers and data entry clerks from 20 CMCs. The Laboratory Division conducted training in *Leptospira* rapid diagnosis as part of the response to a leptospirosis. A course in medical entomology and vector control was delivered to 10 representatives from the Trinidad and Tobago Insect Vector Unit, . The food-borne disease (FBD) programme conducted three major regional workshops; and three in-country workshops to further strengthen national laboratory and epidemiology capacity in FBD surveillance

Research Folder

The CAREC research agenda is based on Regional and Caribbean Commission of Health priorities:

1. HIV/AIDS
2. Vector-borne diseases
3. Foodborne diseases
4. Emergence and re-emergence of infectious diseases
5. Vaccine-preventable diseases
6. Noncommunicable Diseases

National and regional links

Subregional

1. University of West Indies, University of Guyana, University of Suriname
2. Caribbean Health Research Council (CHRC)
3. Secretariat of the Caribbean Community (CARICOM).

Regional

1. Center for Disease Control and Prevention(CDC) Atlanta, GA. USA