



Protecting and enhancing the livelihoods, environments and economies of the Caribbean Basin

# Coastal Area Climate Change Education (CACCE) Workshop on Impacts of Climate Change over the Caribbean Countries

1-3 February 2012, Mayaguez, Puerto Rico

## Building Resilience through Effective Communication

*Judi Clarke, Regional Coordinator*

*The CARIBSAVE Partnership*



Caribbean Climate Change & Livelihoods: A sectoral approach to vulnerability and resilience  
*Water, Energy, Biodiversity, Tourism, Agriculture, Human Health, Infrastructure and Settlement, Gender, Comprehensive Disaster Management*  
A Not-For-Profit Company



... what happens when we speak to a non-technical audience in science jargon, instead of a language they understand (e.g. plain English about things that matter to them).



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## About CARIBSAVE

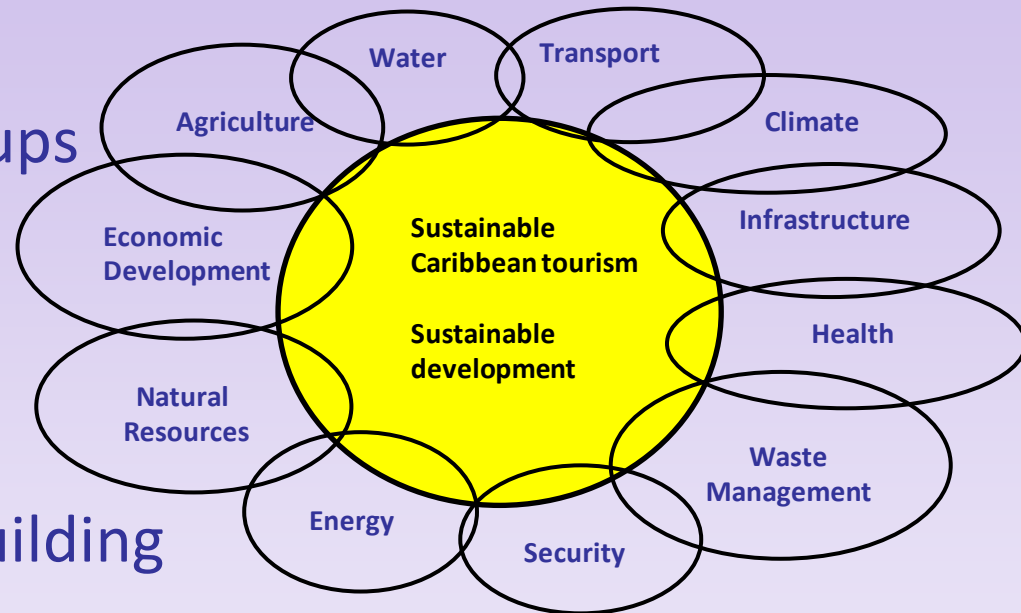
- Formed in 2008
- Now a not-for-profit company (research and technical)
- Scope is the Caribbean Basin
- Regional Headquarters in Barbados
- Strategic partnerships and capacity building of Caribbean nationals
  - CCCCC, Oxford University, University of Waterloo
  - Climate Studies Group, U.W.I - Mona
  - Institute for Gender and Development Studies, U.W.I – Mona
  - Scholarships



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# CARIBSAVE Programmes and Projects

- Evidence-based
- Within and across-sectors
- Variety of stakeholder groups
  - Primary beneficiaries
  - Facilitators
  - Collaborators
- Awareness and capacity building
- Communication and dissemination of results
- M & E



Caribbean Climate Change & Livelihoods: A sectoral approach to vulnerability and resilience

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## Draft CARIBSAVE Communications Strategy

- Public relations
- Public awareness and education
  - Goal is to reduce the vulnerability to climate change in various stakeholder groups in the Caribbean through increased awareness and building capacity to adapt
  - Built into all projects
  - Supports communications component of the Regional Implementation Plan
    - Programme Framework in the IP endorsed by CARICOM COTED in June 2011



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# Draft CARIBSAVE Communications Strategy

## Objectives

1. To promote **inter and cross ministerial interactions** amongst the ministries responsible for tourism and related sectors in the Caribbean region to improve their understanding and application of participatory development;
2. To increase the understanding of the **linkages between climate change impacts on tourism and other related sectors** including disaster management;
3. To **raise awareness about climate change impacts and adaptation amongst vulnerable stakeholder groups**;
4. To **share lessons learnt, research results, opportunities and success stories on climate change adaptation** in the Caribbean region to serve as a model and to extend their impact.



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# Selected CARIBSAVE projects and how they contribute to climate change awareness and education



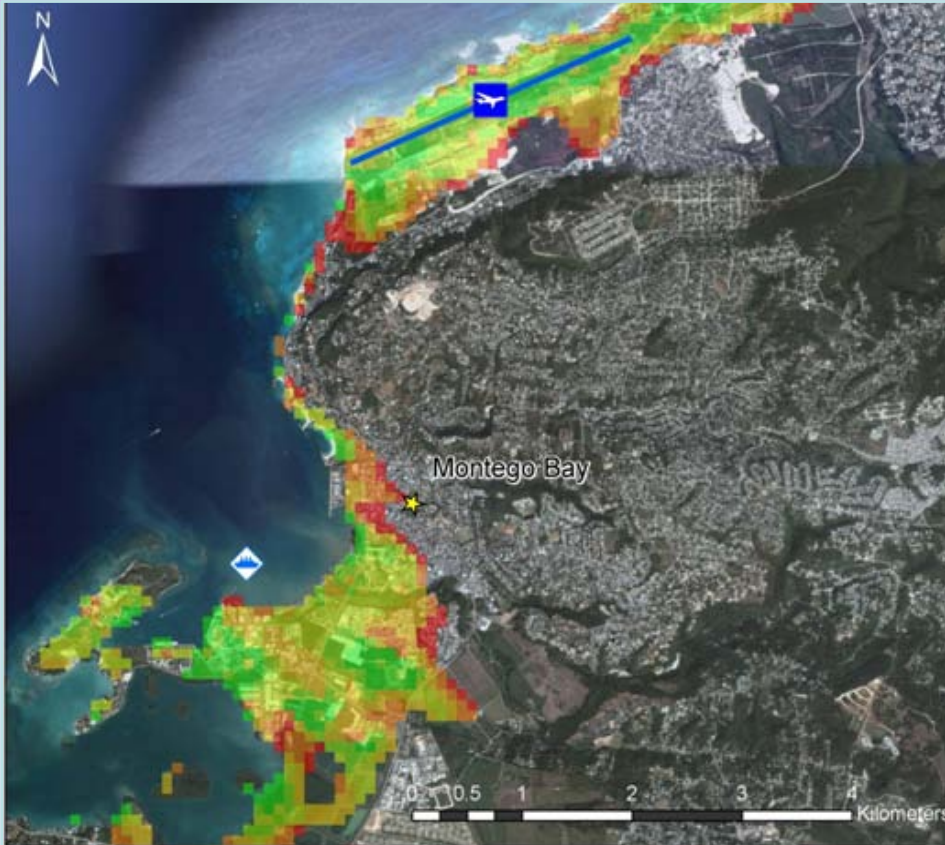
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# CARIBSAVE Climate Change Risk Atlas

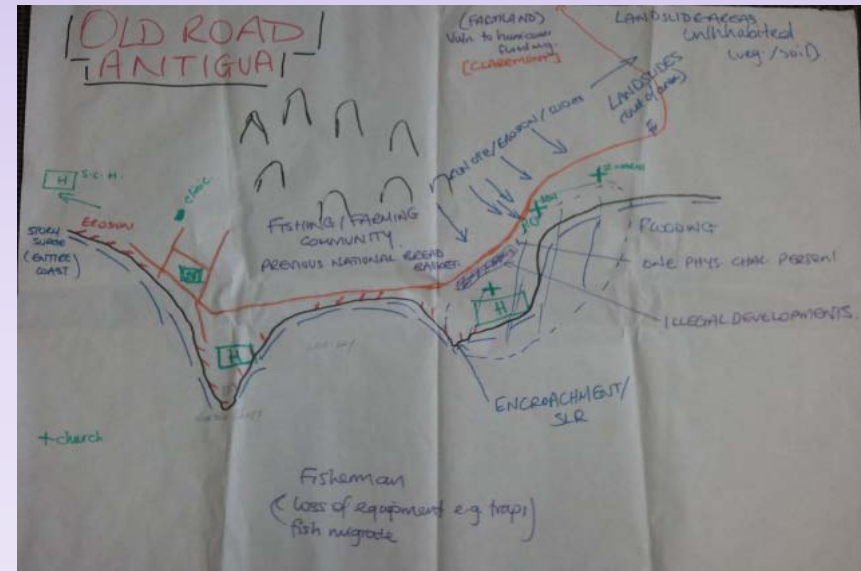
- Pilot phase 2008 - 2009; Phase I: 2009-2011
- Vulnerability assessment of tourism and related sectors
- Public sector, private sector, communities
- Public awareness and education
  - One-on-one meetings
  - Participatory stakeholder workshops
  - Community vulnerability mapping
  - Risk Profile, Summary Document, Briefing Note
  - Data visualisation, short films



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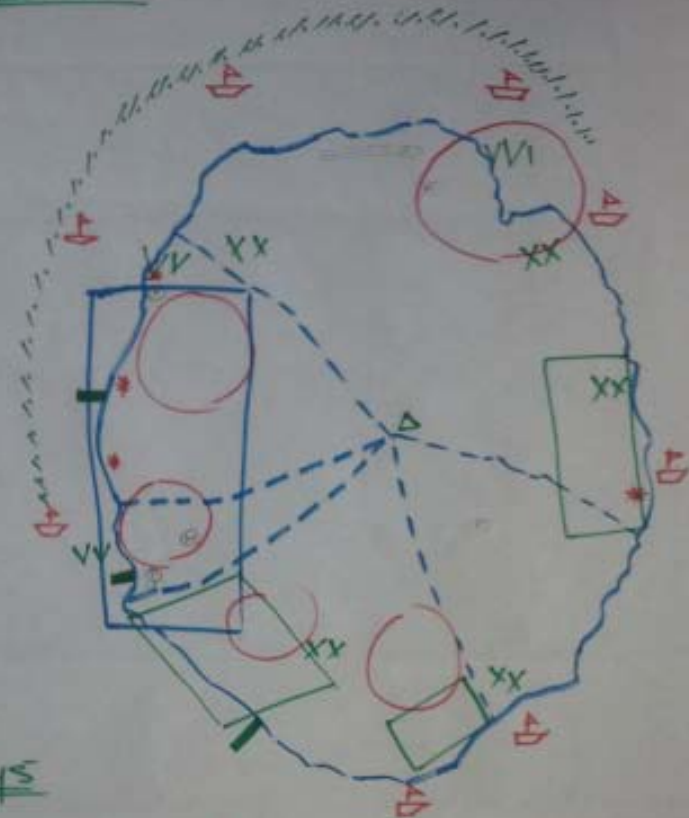


1, 2,3 m SLR and storm surge maps



## community vulnerability map

# Nevis



## KEYS

----- → CORAL REEFS

○ → FLOODING

VV → MANGROVE

XY → AGRICULTURE

□ → ECONOMIC ACTIVITY

□ → INDUSTRIAL ACTIVITY

△ → VOLCANIC ACTIVITY

⊠ → FISHING

P → POLICE STATIONS

F → FIRE STATIONS

≡ → V.A. SOT'S AIRPORT

— → FERRY TERMINAL

H → HOSPITAL

\* → HISTORICAL SITES

Community  
vulnerability  
map of Nevis



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## CARIBSAVE Film Series

- Partnerships for Resilience
  - Climate Change and Caribbean Tourism
  - Caribbean Fish Sanctuaries
  - Living Shorelines
- Film screenings
- Available on DVD and  
[www.youtube.com/caribsave](http://www.youtube.com/caribsave)



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## Partnership for Canada-Caribbean Community Climate Change Adaptation (ParCA)

- 2011-2016; 4 communities (inc. 1 in Jamaica; 1 in Tobago)
- CBVA to integrate local knowledge and science
- Public awareness and education
  - the project website; Google Earth, weADAPT portal
  - sharing research outputs and collaboration through the
  - Community of Practice forum
  - Exchange visits
  - Scholarships for Caribbean nationals



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## Climate Change Coastal Community Enterprises: Adaptation, Resilience and Knowledge (CCCCE-ARK)

- 2012 – 2014; 8 communities in Barbados, Bahamas, Belize, Jamaica
- To build resilience of livelihoods (agriculture, tourism, craft, fishing) & democratise climate change
- Public awareness and education
  - Awareness building workshops
  - Knowledge products (community and sector-specific)
  - Training workshops



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## Caribbean Fish Sanctuaries Initiative

- Pilot in Jamaica, 2010-2011; Regional project 2012 – 2015
- A strategy for building resilience to climate change and improving the sustainability of livelihoods in the coastal communities
- A sustainable financing mechanism to supplement existing funding
- Public-private partnership in the tourism, fisheries and craft sectors that would provide tangible and lasting benefits for communities, businesses and the management of natural resources.



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## Greening Tobago: Why and How?

- 2011 - 2014
- Goal is to promote greater awareness and support for the wider benefits that “carbon neutrality”, the “green economy”, and the associated “clean tech” business opportunities could bring to the economy and environment of Tobago.
- Public education and awareness
  - Sustainable development components (water conservation, food security, ecosystems and sustainable livelihoods)
  - Available technologies and the benefits



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# Caribbean Schools Programme for Climate Resilience

- Develop Framework for a Regional education programme for Caribbean secondary schools aimed at increasing understanding and awareness of **climate change** and of the **opportunities for adaptation and resilience**.
- Work closely with the **Caribbean Examinations Council (CXC)** to ensure that the **Caribbean Advanced Proficiency Examinations (CAPE)** syllabus in Environmental Science is adapted to reflect the growing relevance of climate science to the region's economic and environmental sustainability.





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## Rationale

- Lack of educational materials on climate change for teachers and students with Caribbean content
- Lack of regional coordination of educational activities on CC
- Increasing number of students studying Environmental Sciences (e.g. In SKN 8 students in 2004 and 90 in 2011)
- Existing CXC curriculum does not address climate change



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# CAPE Environmental Science

## *A Good Starting Point*

- There are opportunities to infuse climate change to the curriculum with respect to syllabus objectives without changing much of the content.
- As a fairly new subject in the Caribbean context, there is relatively little resource material/literature available to students and teachers. The main textbooks used are from Europe and North America with examples that are non-Caribbean
- Strong support from Mr. Phillip De Silva, Chief Examiner, CXC-CAPE Environmental Science, Dean, Faculty of Natural Sciences, University of Guyana



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## CAPE Environmental Science

CAPE Environmental Science consists of Units 1 and 2 over a 2-year period.

### **Unit 1 comprises 3 modules:**

- Fundamental Ecological Principles
- Human Population and the Environment
- Sustainable Use of Natural Resources

### **Unit 2 comprises 3 modules:**

- Agriculture and the Environment
- Energy and the Environment
- Pollution of the Environment



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## Activities to Develop the Programme

Establish **Regional Steering Committee** comprised of educators and scientists selected from across the Caribbean region.

**1. Scoping and Consultations**

**2. Content Development**

**3. Development of Educational Products**

**4. Pilot Projects in Selected Countries**



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## Phase 1: Scoping and Consultations

- A scoping study of existing climate change materials and relevant research
- Consultations with CAPE-CXC, Ministries of Education and Environment and key educators to explore the addition of climate change into the current curriculum and develop a structure and approach for integration into curricula.
- Establish **Regional Working Group** comprised of selected teachers and outstanding students to act as a **Regional Ambassadors for Climate Resilience**.
- Hold regional workshops to review findings and define Work-Plan



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## Phase 2: Content Development

Content to consist of various “thematic chapters” such as the following:

- Climate Change and Coastlines
- Climate Change and Marine Ecosystems
- Climate Change and Terrestrial Ecosystems
- Climate Change and Water Resources
- Climate Change and Agriculture and Agro-Biodiversity
- Climate Change and Tourism
- Climate Change and Land Use or Land Management
- Others...



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## Phase 3: Development of Educational Products

The content developed in Phase 2 to be incorporated into:

- **Textbook on Climate Change for Caribbean Secondary Schools**
- **Website**
  - Ring-fenced “peer-reviewed” information including:
    - Data, Projections, Lesson Plans, Case studies, Best Practice...
  - User-generated content:
    - Video Blog/ Social Media
    - Data collected – e.g. Sandwatch, Globe



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## Phase 4: Pilot Projects in Selected Countries

- The products will be piloted in several Caribbean countries to get feedback from students and teachers.
- Hold National Training Workshops for Teachers
- School visits and training for field work/data collection
- Monitoring and Evaluation





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## Important Considerations

- Develop a Regional Framework that can adapt and evolve with incremental benefits and new satellite activities
- Capture regional synergies and catalogue best practices (success stories) from across the Caribbean using ICTs and video
- Promote active involvement at national and community level to build sense of local ownership of content
- Focus on information that is relevant to livelihoods and communities, and to opportunities for adaptation, mitigation and resilience



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## Next steps and hopes...

- CARIBSAVE to continue project-specific awareness efforts
- Work with the CCCCC, CANARI and Panos Caribbean to develop a regional programme and seek funding for implementation
  - Caribbean Schools Programme for Climate Resilience
  - Target all identified audiences
  - Sustained efforts



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## Insanity...

- ...is doing the same thing over and over again and expecting different results (*Albert Einstein*).
- So...
  - Climate change by any other name...
  - Find out what stakeholders are willing to do and what they are capable of doing
  - Not only what can I do but “what’s in it for me”?
  - Engage those in the business of communicating and educating
  - Sustained and targeted efforts are necessary



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***Thank you!***

***Gracias!***

***Merci!***

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