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First Meeting of the Contracting Parties (COP) to the
Protocol Concerning Pollution from Land-Based Sources
and Activities (LBS Protocol) in the Wider Caribbean
Region

Punta Cana, Dominican Republic, 24 October, 2012

STATUS OF ACTIVITES

**SUB-PROGRAMME ON THE ASSESSMENT AND MANAGEMENT OF
ENVIRONMENTAL POLLUTION (AMEP) FOR
2010-2012**

[Covering the period 1 January 2010-30 June2012]

For reasons of economy and the environment, Delegates are kindly requested to bring their copies of the Working and Information documents to the Meeting, and not to request additional copies.

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Programme Overview

1. This report presents the status of activities for the Sub-Programme on the Assessment and Management of Environmental Pollution (AMEP) in support of the Protocol Concerning Land-Based Sources of Marine Pollution (LBS Protocol) and the Oil Spills Protocol for the period 2010-2012.
2. The objectives of the AMEP Sub-Programme are to:
 - a) Coordinate and oversee the day-to-day implementation of AMEP Projects and activities within the framework of the Caribbean Environment Programme (CEP);
 - b) Ensure that the formulation and implementation of projects and activities satisfy the obligations of the LBS and Oil Spills Protocols;
 - c) Promote ratification of, accession to, and effective implementation of the LBS and Oil Spills Protocols;
 - d) Enhance coordination, collaboration and communication with relevant regional and international organizations in the development and implementation of AMEP projects and activities; and
 - e) Enhance involvement of LBS and Oil Spills Regional Activity Centers (RACs) in the design and implementation of AMEP's projects and activities.
3. The AMEP Programme Officer continued to be responsible for the coordination and supervision of the implementation of the programme's activities for the reporting period. The Programme Officer for the CETA sub-programme provided assistance in public awareness and information management during the reporting period until her retirement in October 2011. During the reporting period, funds were identified from the GEF IWCAM and REPCAR projects to support the AMEP Assistant Programme Officer until December 2011. This Officer assisted in the execution of project activities for both projects and provided general support to the AMEP Sub-Programme. During the 2010-2012 period seven (7) interns (Amanda Preston, Rebecca Stuart, Kimberly Lyon, Khian Lamey, Swati Garg, Kathleen Nazareth and Gregory Lohrke) worked with the AMEP Secretariat; Ms. Kimberly Lyon worked specifically with the GEF REPCar project. Swati Garg, Kathleen Nazareth and Gregory Lohrke were students from Indiana University, USA were attached to partner UNEP projects and organizations. The Coordinator of CAR/RCU continued to play a supporting role in promoting ratification and implementation of the LBS Protocol. The Directors of the LBS RACs and the Regional Project Managers for the GEF Projects provided additional programming and technical support.
4. The Entry into force of the MARPOL Special Area Designation for Annex V ship generated wastes for the Caribbean became effective in May 2011. This effort was lead by the Regional Activity Centre for Oil Spills, RAC REMPEITC with the support of the AMEP Secretariat.
5. During the reporting period the AMEP Secretariat was represented at several regional and global meetings and conferences. AMEP representatives contributed with oral and poster presentations, exhibition booths with videos, promotional material, and posters of CEP's work. These meetings included *inter alia* the Latin America and Caribbean (LAC) Consultation Meeting for the Global Environment Outlook (GEO-5); 5th Biennial Caribbean Environmental Forum and Exhibition (CEF 5) in Montego Bay, Jamaica; the 5th International Marine Debris Conference held in Hawaii, in March 2011; the third LAC regional meeting on the Strategic Approach to International Chemicals Management (SAICM) in Panama, June 2011; the 6th GEF Biennial International Waters Conference, October 2011 in Dubrovnik, Croatia; 6th Biennial Caribbean Environmental Forum and Exhibition(CEF 6); Regional Negotiation Skills Training Workshop,

St. Kitts and Nevis, May 2012 and other global fora discussing trans-boundary pollution and its impacts.

6. AMEP contributed to the Oceans, Coasts and SIDS report which was prepared as part of the Global Ocean Forum report on Oceans for Rio+20. Technical publications, press releases and newsletters were also produced and disseminated. During the reporting period the AMEP Programme Officer participated in a two part training exercise under the UN Management Development Programme for senior professionals.
7. The Secretariat continued to place special emphasis on activities for the promotion of the LBS protocol at the national and regional levels during the 2010-2012 period. During the reporting period four Governments; the Governments of Antigua & Barbuda, Guyana, the Bahamas and more recently Grenada acceded to the LBS Protocol. As a result of these ratifications the LBS Protocol entered into force in August 2010. An LBS Protocol Ratification Technical Cooperation exercise (TCC) was held during the reporting period in Saint Lucia involving participants from Saint Lucia, Dominica and Grenada. This GEF IWCAM sponsored workshop facilitated the exchange of experiences and the development of road maps for ratification of the LBS Protocol by Dominica and Grenada. Promotional activities included the organization of a Wider Caribbean LBS Collage Competition in recognition of the entry into force of the LBS Protocol. Nine (9) countries of the Wider Caribbean Region participated in the competition: Anguilla, Antigua and Barbuda, Barbados, Guadeloupe, Guyana, Jamaica, Saint Lucia, Saint Vincent and the Grenadines, and Venezuela. Students from Anguilla, Jamaica and Barbados placed first, second and third respectively. The prizes were announced at an official award ceremony, which took place during a five (5) day Regional Expert Workshop on Environmental Monitoring and Assessment, convened in Montego Bay, Jamaica.
8. The production and dissemination of the AMEP Newsletter was continued during the reporting period. The AMEP Secretariat provided input to the development of a social media page for the CEP website. This social media page was created for children and adults and includes public service announcements for TV and radio, photo slide shows and animations. The revised CEP website was launched in July 2010, and is continually being updated and improved. There were improvements to the online interactive map on the website with the addition of additional information relating to the GEF CReW and GEF REPCar Projects.
9. The AMEP Secretariat continued to develop and strengthen relationships with relevant regional organizations. Coordination meetings were held with several collaborating agencies including the United Nations Environment Programme Global Programme of Action (UNEP/GPA), the UNEP Regional Office for Latin America and the Caribbean (ROLAC), the Caribbean Environmental Health Institute (CEHI), the Organization of Eastern Caribbean States' Environment and Sustainable Development Unit (OECS/ESDU), Pan American Health Organization (PAHO), the UN Economic Commission for Latin America (UNECLAC), the Caribbean Community (CARICOM), the Water Centre for the Humid Tropics of Latin America and the Caribbean [el Centro del Agua del Trópico Humedo para America Latina y el Caribe (CATHALAC)], the Marine and Coastal Research Institute [el Instituto de Investigaciones Marinas y Costeras (INVEMAR)], National Oceanic and Atmospheric Association (NOAA), US Environmental Protection Agency (EPA), the Ocean Conservancy, the Association of Caribbean States (ACS), UN Development Programme (UNDP), United Nations University, Institute for Water, Environment and Health (UNU-INWEH), the Commission of the European Union (EU), Intergovernmental Oceanographic Commission Sub-commission for the Caribbean and adjacent regions (IOCARIBE), and the Inter-American Development Bank (IADB); Caribbean Water and Sewage Association (CAWASA), and the Caribbean Water and Wastewater Association (CWWA)
10. LBS RACs continued to play an important role in the development and implementation of AMEP projects. The Institute of Marine Affairs (RAC IMA), facilitated the implementation of a National Programme of Action pilot project in Trinidad and Tobago, RAC IMA participated

and represented Trinidad and Tobago in the Interim Working Group on Environmental Monitoring and Assessment and supervised the preparation of a public education and awareness DVD to inform the general public about the CEP and the importance of the Cartagena Convention and its Protocols. The DVD is one of the several promotional items produced by RAC-IMA to promote ratification/accession to the Conventions and its Protocols.

11. RAC Cimab finalized the update of Technical Report 33 in English, Spanish and French which has now been published as a new CEP Technical Report # 52. RAC Cimab, participated in the Interim Working Group on Environmental Monitoring and Assessment, and produced and finalized various fact sheets with information presented in recent technical reports including the CEP Technical Report No. 52, Regional Wastewater Baseline Analysis and the Know-Why Network (KWN) Partnership Project
12. In support of UNEP's Global Programme of Action, a pilot NPA was completed in Suriname in May 2011 Collaborative efforts with NOAA and UNEP GPA led to the development of new activities in support of NPA implementation with new activities now being implemented in the Dominican Republic, Saint Lucia and Suriname. Such collaboration is expected to continue in the current biennium.
13. Following the development of the Regional Action Plan on Marine Litter Management (RAPMaLi), AMEP continued to support activities for its implementation. UNEP CAR/RCU continued to build on its partnership with the Ocean Conservancy to support Annual International Coastal Clean-ups (ICC) in the WCR.
14. The Project Coordinating Units for the two GEF projects, Integrating Watershed and Coastal Area Management for Caribbean SIDS (IWCAM) and Reducing Pesticide Runoff to the Caribbean Sea (REPCar), continued to operate successfully throughout the reporting period. Some of the major achievements included the showcasing of these projects at regional and international fora such as the 6th GEF Biennial International Water Conference October 2011 in Dubrovnik Croatia. There was further development of project websites, successful execution of Demonstration Projects, and training in Environmental Monitoring and the use of Environmental Indicators. These projects contributed to improved watershed, coastal zone management and agricultural practices and created long-term mechanisms for sustainable development in Caribbean SIDS and Central America. The GEF REPCar project activities ended in December 2011, while the GEF IWCAM project activities ended in June 2012. All final reports for both projects will completed by December 2012.
15. Wastewater management continues to be a key focus of the AMEP Work Programme. Efforts to develop national planning mechanisms to control marine pollution from domestic sewage and detailed project plans for improving infrastructure for sewage and wastewater management were successfully completed in Jamaica in 2010 and in Belize in 2011.
16. The AMEP Programme Officer worked with UNEP's Regional Office for North America (RONA), ROLAC and the Inter-American Development Bank (IDB), to further develop the GEF Project Proposal for CReW. The project received endorsement from the GEF CEO in November 2010. A Memorandum of Understanding was signed between UNEP and the IDB in September 2011 for the implementation of the project. The project officially commenced in January, 2012 for UNEP CAR/RCU.
17. The AMEP Secretariat continued its support to the development of regional approaches for the integrated management of solid and hazardous wastes in the WCR ,and in coordination with the GEF REPCar Project, collaborated with regional partners on the assessment of Persistent Organic Pollutants (POPs) and other hazardous non-point source pollutants . AMEP Secretariat and GEF REPCar Project continued discussions with UNEP DGEF on the development of new GEF POPs project proposals for Integrated Chemicals Management in Caribbean SIDS and in Central and South America as a follow up to the current REPCar Project.

18. Based on the achievements and lessons of the GEF-REPCar and GEF IWCAM projects, two new GEF proposals were developed entitled “Improved management of agrochemical life cycles in the Caribbean and Central American region” and Implementing Integrated Land, Water & Wastewater Management in Caribbean SIDS.” The first PIF has been endorsed by eight(8) countries: Colombia, Costa Rica, Dominican Republic, El Salvador, Honduras, Jamaica, Nicaragua and Panama. The second PIF was endorsed by ten (10) countries: Antigua and Barbuda, Barbados, Cuba, Dominican Republic, Grenada, Jamaica, St. Kitts and Nevis, Saint Lucia Saint Vincent and the Grenadines and Trinidad and Tobago. Both project proposals (PIFs) were submitted to the GEF Secretariat for consideration. The PIF Implementing Integrated Land, Water & Wastewater Management in Caribbean SIDS received GEF clearance for inclusion in the June work programme and submission of the full project proposal is expected to take place during the first quarter of 2013.
19. During the reporting period discussions commenced on an agreement between UNEP and UNOPs, for the implementation of activities under GEF IWLearn3. This agreement was finalized between UNOPS and CAR/RCU in March 2012. Under this agreement the First Latin America and the Caribbean (LAC) Targeted Regional Workshop for GEF IW Project” was convened in May 2012, in St. Kitts and Nevis.
20. AMEP continued to support capacity building for the increased use of GIS by Member Governments as a decision-making tool. In collaboration with CATHALAC, a web-based interactive project activity map (IPAM) was created to assist in the dissemination of information regarding AMEP’s activities including the GEF Projects. The purchase of geospatial shipping data in the region by RAC REMPEITC, with support from the Secretariat, is another example of AMEP’s efforts to expand the use of GIS. RAC REMPEITC has developed a GIS -based database for Maritime Traffic in the Wider Caribbean Region. The database is designed to facilitate and strengthen national and regional prevention/preparedness in maritime environmental issues by compiling the information needed for a relevant risk analysis. It provides a visualization of the aggregated routes and the traffic density, as well as ports activities and other data useful for oil spill risk assessment. RAC REMPEITC has also worked with Barbados towards the development of Environmental Sensitivity Index (ESI) Maps which will provide the government of Barbados with well designed maps in GIS format that will facilitate the risk assessment and planning process during an oil spill response. RAC REMPEITC has participated in various regional and international workshops and meetings pertaining to oil spills planning. A GIS Atlas summarizing the major outputs from the GEF-IWCAM project was completed in July 2012.
21. During the 2013-2014 biennium, efforts will continue to increase the involvement of all national and technical focal points involved with AMEP projects and activities

Programme Coordination Cost and Expenditure (in USD)

Project Period	Source of Funds	Projected Budget (2010-2012)	Expenditure (2010-12)
2010-2012	CTF	1,0 90,528	790,000 ¹

22. Outlined in the table below is a summary of the SSA and SSFA contracts undertaken in implementing the AMEP Sub-Programme during the 2010-2012 period, not including contracts under the GEF REPCar and IWCAM Projects:

¹ Office support costs including Communications, Equipment, & Administration for the AMEP Sub-Programme have been estimated up to the end of June 2012.

Contract	Signed Date/Start Date	Expiry Date	Contracted Organizations/Person	Country	Total Cost(USD)
1.	9-Dec-2008	30-Jun-10	Ministry of Health and Environment	Jamaica	25,952.78
2.	1 -Feb -09	30- Feb- 10	Klaus Essig	Venezuela	5,000
3.	1 -Sep -09	31- Aug -10	Marko Tosic	Canada	15,000
4.	7-Sep-09	15- Dec-10	LBS RAC Cimab	Cuba	128,472
5.	1- Oct -09	31 -May -10	Sustainability Managers	Trinidad	90,000
6.	12-Oct-09	3 -Sep-10	Chrishane Williams	Jamaica	3,000
7.	19-Oct-09	11-Jan-10	RAC REMPEITC-Caribe	Curacao	15,000
8.	23 -Oct- 09	15-Sep-10	Anthony Deyal	Trinidad	17,000
9.	1-Nov-09	1-Nov-10	Urban Arts Institute	U.S.A.	25,000
10.	4-Jan-10	31-Jan-11	Nadine Chambers -Goss	Jamaica	16,000
11.	13- Jan -10	1 -Nov -10	Seba Sheavly	USA	10,000
12.	24-Feb-10	24-Mar-10	Julia Vaz Campbell	Jamaica	4000
13.	24-Mar-10	15-Apr-10	Stacie Well Moutrie	Bahamas	3,000
14.	29 -Mar 10	24-Sep--10	Germania Garcia Nelson	Ecuador	9,386
15.	2-Mar-10	30-Aug-11	Ministry of Natural Resources and Environment	Belize	21,360
16.	5 -May-10	10-May 11	Suriname Ministry of Labour , Technological Development and Environment	Suriname	21,400
17.	15 -Jul -10	15-Feb-12	Damian Shaw	Jamaica	4,937
18.	19-July-10	23-Sep-10	Sanya Wedemier	Jamaica	2,720
19.	3-Jan -11	28-Feb-11	Trevor Ramikie	Jamaica	3,000
20.	1-Apr11	15 -Jul -12	Rebecca Stuart	Jamaica	10,562
21.	28-Sep-11	15-Feb-12	RAC REMPEITC-Caribe	Curacao	10,000
22.	21-Oct-11	21- Oct-12	Ministry of Physical Development and the Environment	Saint Lucia	35,000
23.	16-Nov-11	16-Nov-12	Ministry of Labour, Technological Development and Environment	Suriname	20,000

24.	17-Nov-11	17-Nov-12	The Ministry of Environment and Natural Resources	Dominican Republic	15,000
25.	10- May-12	31-Dec-12	PANOS Caribbean	Jamaica	10,000
26.	10- May -12	23 -May -12	Phillip Rhoden	Jamaica	885

Status of the Protocol Concerning Pollution from Land-based Sources and Activities (LBS Protocol)

23. During the reporting period, the Bahamas, Antigua and Barbuda, and Guyana became the seventh, eighth and ninth countries respectively to ratify the LBS Protocol, with nine ratifications the LBS Protocol entered into force on August 13 2010. Grenada, the most recent country to ratify the protocol in 2012, became the tenth country to ratify the LBS Protocol.

Contracting Party	Date of Signature	Date of Ratification	Entry into Force
Antigua and Barbuda		13 July 2010	13 August 2010
Bahamas		24 June 2010	13 August 2010
Belize		4 February 2008	13 August 2010
Republic of Colombia	2 October 2000		
Republic of Costa Rica	6 October 1999		
Dominican Republic	3 August 2000		
France	6 October 1999	4 May 2007	13 August 2010
Grenada		5 March 2012	4 April 2012
Guyana		14 July 2010	13 August 2010
Kingdom of the Netherlands	6 October 1999		
Panama		9 July 2003	13 August 2010
Saint Lucia		30 January 2008	13 August 2010
Trinidad and Tobago		28 March 2003	13 August 2010
United States of America	6 October 1999	13 February 2009	13 August 2010

24. UNEP CEP continued to work with LBS focal points to promote and facilitate the ratification of the LBS Protocol in the Wider Caribbean Region.

Summary of Projects and Activities

25. The following provides a summary of the background, objectives, expected outputs, beneficiary countries, expenditures and status for all projects and activities implemented under the AMEP Sub-Programme for the period 2010-2012. The expenditures are up to June 30th 2012 and are expressed in US Dollars (USD).

A. GEF Projects

(i) Reducing Pesticide Run-off to the Caribbean Sea (GEF REPCar)

Background

26. Annex IV to the LBS Protocol addresses the fact that non-point source pollution from agriculture is a significant contributor to marine pollution in the WCR. In May 1999, UNEP-CAR/RCU received a GEF/Project Development Fund (PDF) grant to develop a project that would improve pesticide management in four countries to reduce pesticide run-off to the Caribbean Sea. The original four participating countries were Colombia, Costa Rica, Nicaragua and Panama.
27. The PDF was concluded in 2001 with the submission of the Project Brief to the GEF Secretariat for approval. The final participating countries were Colombia, Costa Rica and Nicaragua. Funding for the project was approved at the May 2002 meeting of the GEF Council and project execution began in 2005. The project effectively started at the end of 2006 after the project manager was selected and took up the position at UNEP-CAR/RCU.

Objective(s)

28. The main objective of the Project is to:
 - Protect the Caribbean marine environment by reducing the run-off of pesticides, implementing comprehensive management practices and specific measures to control the use and application of pesticides in the agricultural sector.

Expected Outputs

29. The Expected Outputs of the Project are:
 - Development of updated databases on pesticide use including monitoring of impacts of pesticide use in coastal areas;
 - Assessment of the environmental impacts of pesticide use on farms, for different crops, farming systems and practices;
 - A set of validated Good Agricultural Practices (GAP) - Best Management Practices (BMP) for some of the major crops of the MCB region that are environmentally sound, socially acceptable and economically feasible;
 - The acceptance by farmers that the implementation of GAP reduces environmental impact, increases food safety and ameliorates workers welfare, while providing improved marketing opportunities;
 - Progress towards streamlined laws and regulations for pesticide management that allow for adequate control and enforcement;
 - Market forces motivating agricultural producers to implement GAP through the promotion of crop certification programmes in national markets, recognizing that environmentally-friendly production is an added value;
 - Improved public awareness on the importance of preventing agricultural-based sources of marine pollution;
 - Consolidated Regional and National frameworks for the prevention and improved management of agricultural sources of pollution. Substantial progress made towards the ratification of the LBS protocol in the participating countries.

Beneficiary Countries

Nicaragua, Costa Rica and Colombia

Project Cost and Expenditure (USD)

Project Period	Total Project Cost	Source of Funds	Biennial Budget (2010-12)	Expenditure (2010-12)
2005-2011	4,395,000	Global Environment Facility (GEF) Croplife LA	1,268,564	1,323,916

Project Status (completed)

Component 1-Project Coordination

30. The Regional Project Coordination Unit was established at the end of 2006, while National Coordination Committees started activities in early 2007. The project's work plan was updated in 2007 with new needs and priorities expressed by the National Committees. The National Coordinating Units were strengthened, and as a result, a good level of ownership was obtained in the project countries.
31. A total of five Steering Committee Meetings have been held since the project's inception where the status of the project was reviewed, and work plans discussed and endorsed. The project results and achievements were also appraised. There were delays in the implementation of some demonstration projects; and extension of the GEF-REPCar project was approved until December 2011. Two regional advisory panels were established and have effectively given technical and scientific guidance to the coastal monitoring programme and the demonstration projects on GAP.
32. The Mid-Term Review, conducted in the last Biennium by an external evaluator, rated several aspects of overall project implementation satisfactory and highly satisfactory. The final reports were submitted to UNEP in March 2012. A final regional publication, available in Spanish and English, integrates the project components and summarizes results and achievements. All substantial activities were finalized by the end of 2011. An external Terminal Evaluation will be conducted during the course of 2012. As part of the information dissemination strategy, the project web page will be maintained to ensure that all training resources and reports are available.
33. The project's achievements will be presented at national, regional, and international meetings, forums, workshops and congresses to promote better use of pesticides and raise awareness at different levels. These will also be used to gain political commitment to ratify the LBS protocol.

Component 2-Demonstration Projects

34. Demonstration projects were established in 2008 and 2009 to validate GAP and BMP for Pesticides. The projects served as a basis for training programmes for farmers and technicians and implemented innovative Integrated Pest Management (IPM) techniques which were adapted to the needs of the farmers. The Project fostered the development of local skills and promoted the sustainability of the activities after the closure of the GEF-REPCar project.
35. Two crops-regions were selected in each country, taking into consideration the environmental impact in terms of the risk of pesticide runoff to the Caribbean Sea. Colombia worked on bananas and plantains in the regions of Urabá and Magdalena (August 2008 - June 2011, area of influence: 17,000 ha small export plantain growers in Urabá and 11,000 ha banana in Magdalena). In Costa

Rica, demonstration projects on bananas and pineapples in the Caribbean watersheds were carried out from March 2009 to June 2011 (area of influence: banana 43,000 ha; small and large scale pineapple farming 45,000 ha). In Nicaragua, demonstration projects on beans and oil palm in the North and South Atlantic Autonomous Regions were carried out from March 2009 to October 2011 (area of influence: 8,000 ha small bean and rice farmers in RAAN; 1,300 of small and medium oil palm producers in RAAS).

36. The reduction in pesticide use ranged from 8% to more than 50% in some of the demonstration projects, depending on the sanitary problems of the demo crop and experiences in the introduction of GAP prior to the Project. In several cases, the demonstration projects showed a reduction in the presence of pesticide residues in the surrounding water bodies
37. In Colombia, nearly 400 farmers and technicians received direct technical assistance from the demo projects. In Costa Rica, 126 banana farms and over 200 pineapple producers were linked to the demonstration projects while in Nicaragua over 400 farmers and technicians benefited from the demonstration projects.
38. Training materials, GAP and other manuals were produced for each crop and distributed among beneficiaries. Some of the key publications were translated into English to facilitate the sharing of experiences with the English-speaking Caribbean. All materials are available from the GEF-REPCar website.

Component 3-Monitoring of Environmental Impact of Pesticides

39. During the 2004-2009 period statistics on the production, import and export of pesticides by Colombia and Nicaragua were compiled by the project. In Costa Rica, the Project partnered with a University and statistics on the importation of pesticides from 1977 to 2009 were compiled. These reports also included statistics of agricultural land use, which served as an indicator of the potential use of pesticides. The Southwest Caribbean is a region with flourishing agricultural activity that utilizes a significant amount of pesticides.
40. During the last Biennium, in 2008 a coastal monitoring programme was developed, with the participation of leading environmental research institutes, to establish a baseline of pesticide residues in the coastal and marine environments. A detailed technical manual was developed and a regional training workshop was held. The first assessment of the presence of pesticide residues in water and sediment samples of 13 monitoring sites, with replicates during wet and dry seasons, was finalized in June 2009. Based on the results, the design of the programme was adapted and a new phase took place from the second semester of 2009 to the beginning of 2011.
41. To guarantee the quality of the results obtained; the capacities of the participating labs were strengthened through the acquisition of equipment; 3 regional workshops; and 3 specific national training courses. Additional capacity building took place through the implementation of laboratory quality control procedures and the development of an inter-laboratory comparison exercise. One laboratory now has 1710 pesticide-related tests accredited (equivalent to ISO 17025), the two other labs have made significant process towards accreditation.
42. In general, the project results showed that the concentrations found during the coastal monitoring exercise were low when compared to international standards. Nevertheless, some compounds are of concern due to their frequent detection. A database was established through the project, and can be consulted via the internet by officers of the Ministries of Environment. National meetings and events were held to review the results of the monitoring programme, primarily with the members of the National Coordinating Committees, and to plan for the revision of policies and pesticide management strategies. A final regional report was published in the beginning of 2012 and is available on the project's website in Spanish and English.
43. The project has established cooperation with complementary projects of other agencies such as the IAEA and the UNU-INWEH within the scope of the monitoring programme. This cooperation has

led to the sharing of technical information and resources for training and data publication, and to an alliance for the development of complementary activities.

Component 4-Institutionalize Improved Pesticide Management and Strengthen the Capacity for Reducing Pesticide Runoff

44. In addition to the training offered by the demonstration projects, GEF-REPCar organized complementary training and awareness projects. “Learning by doing”, succeeded in significantly impacting the rural population in the areas of influence. Through these programmes, which are supported with funds received from CropLife LA, over 5,000 farmers participated in Colombia in basic training in GAP and BMP for Pesticides. In Costa Rica and Nicaragua, nearly 900 and 200 technicians respectively, participated in advanced training in GAP, integrated pest management, BMP for pesticides and related topics.
45. As a complement to the work of the monitoring programme for pesticide residues, demonstration projects and training and awareness activities, GEF-REPCar encouraged the dissemination of information on the existing legal and regulatory framework for management of pesticides in each country. Similarly, national crop-certification programmes in good agricultural practices were promoted. Colombia had already established a programme, Costa Rica developed a national certification programme and Nicaragua carried out exploratory work. These activities were carried out in association with the productive sector.
46. The project website, established in 2007, was continuously expanded and includes an interactive map-based information platform, technical protocols, GAP manuals and other publications. Project flyers were printed in Spanish and English for sensitizing the public and several posters were made for the use in national, regional, and international events. A quarterly bulletin service was started in 2009 after the launch of all demonstration projects; 9 editions were published and disseminated to project stakeholders. The project website was updated with training materials that were developed. The project web page will continue to be accessible through the UNEP CAR/RCU website.
47. The project has participated in over 50 national and international technical and scientific events, including congresses, workshops, environmental forums and agricultural fairs. By participating in these events, the project increased awareness at different levels and gained the interest of policy/decision-makers for ratification of the LBS protocol.
48. Based on the achievements and lessons of the GEF-REPCar project, a new GEF proposal (PIF) was developed in 2010-2011. “Improved management of agrochemical life cycles in the Caribbean and Central American region” would have a broader geographic scale, consider a wider variety of crops and also strive for an improved use of agrochemical products in the developing tourism sector in coastal areas. The PIF has a total GEF budget of US\$ 17.7 million and has been endorsed by Colombia, Costa Rica, Dominican Republic, El Salvador, Honduras, Jamaica, Nicaragua and Panama and received the support from the FAO, PAHO, UNU-INWEH, the Regional Centre for Central America and Mexico of the Basel Convention, WWF, CropLife LA, Rainforest Alliance and Global GAP. In 2012, the PIF was amended for its formal submission to the GEF Secretariat. The proposal did not receive GEF approval and the Secretariat will continue to discuss with partners and interested countries on the possible revision of the proposal for resubmission during the next biennium to the GEF Secretariat.

(ii) Integrating Watersheds and Coastal Areas Management in Small Island Developing States in the Caribbean (GEF IWCAM)

Background

49. The Global Environment Facility (GEF) funded a project to support 13 Caribbean SIDS (Antigua and Barbuda, Bahamas, Barbados, Cuba, Dominica, Dominican Republic, Grenada, Haiti, Jamaica, Saint Kitts and Nevis, Saint Lucia, Saint Vincent and the Grenadines and Trinidad and Tobago) to address issues related to the integrated management of watersheds and coastal areas. It supports national pilot demonstration activities on Integrating Watershed & Coastal Area Management (IWCAM) to address priority issues with the potential for replication across the region and in other Small Island Developing State (SIDS) regions.
50. The project recognizes the highly integrated and closely interlinked nature of watersheds and coastal areas in small islands and aims to develop a more sector-coordinated management approach at national and regional levels. It places a strong emphasis on an expanded role for all stakeholders within a participatory management framework. The project further recognizes the constraints on the development and implementation of an integrated and sectoral-coordinated management approach in the absence of applicable and cost-effective solutions to many of the primary threats and their root causes.

Objective(s)

51. The overall objective is to strengthen the commitment and capacity of the participating countries to implement an integrated approach to the management of watersheds and coastal areas, with a long-term goal of enhancing the capacity of the countries to plan and sustainably manage their aquatic resources and ecosystems. At the same time, the project seeks to build regional capacity among institutions and within the Executing Agencies to ensure sustainability of the IWCAM practices and principles beyond the life of the Project

Expected Outputs

52. The expected outputs of the project are for the following components:
 - Demonstration, capture and transfer and best practices
 - Development of IWCAM process, stress reduction and environmental status indicator framework;
 - Policy, legislation and institutional reforms
 - Regional and national capacity building and sustainability; and
 - Project management and coordination.

Beneficiary Countries

Antigua and Barbuda, Bahamas, Barbados, Cuba, Dominica, Dominican Republic, Grenada, Haiti, Jamaica, Saint Kitts and Nevis, Saint Lucia, Saint Vincent and the Grenadines and Trinidad and Tobago.

Project Cost and Expenditure (in USD)

Project Period	Total Project Cost	Source of Funds	Projected Budget (2010-12)	Actual Budget (2010-12)	Expenditure (2010-12)
2005-2012²	14,082,691 ³	GEF	4,479,619	3,558,408.62	2,824,288.72⁴

Project Status (completed)

Component 1 - Demonstration, Capture and Transfer of Best Practices

53. This component focused on “On the ground “demonstrations which targeted national hotspots where specific threats to national, regional, and global environmental amenities were identified. These hotspots were identified during the project development phases of the project. All of the demonstration projects were completed by the end of 2011. The demonstration projects were intended to be innovative and show how reducing contaminants can address water scarcity and also improve the quality of the marine environment and coastal resources. These projects were vehicles through which environmental change can be measured. For those countries that did not develop demonstration projects, small-scale pilot activities were identified for implementation, specifically related to Integrated Water Resources, Watershed and Coastal Zone Management. Other activities included: public awareness, environmental monitoring, installation of rainwater harvesting systems, construction of wetland filtration systems, and improvement in domestic sanitation systems, all of which contributed to stress reduction in participating countries.
54. During the reporting period increased emphasis was placed on the capture of lessons and best practices. Lessons learned and good practices were written in the form of Case Studies and Experience Notes. Exchange of experiences with other relevant projects and regions continued during the reporting period and study tours were conducted to GEF IWCAM demonstration sites and best practices transferred to visiting projects and organizations
55. Advances were made with the regional Project Information Management System (PIMS) and the development of a Clearing House Mechanism “GeoNetwork” during the reporting period. GeoNetwork enables strong linkages to relevant websites and databases as well as the inclusion of some GIS tools. It enables more efficient upload of material, searches and possible on line training opportunities. Components will include a database on GEF-IWCAM contacts and relevant on- going and completed projects. This CHM will be managed at UNEP CAR/RCU to ensure long-term sustainability.

Component 2 - Development of IWCAM Process, Stress Reduction and Environmental Status Indicators Framework

56. All demonstration projects prepared indicators and provided them to the IWCAM Project. Based on the indicator template developed in 2008, pilot testing was conducted in 2011, utilizing Barbados as the pilot country .The pilot activity sought to develop a user-friendly database. Training of stakeholders in the application of relevant indicators and the indicator template took place during the reporting period. Hotspot diagnostic analyses (HSDA) was conducted with emphasis on the non-demo countries, including identification of priority water-related issues/problems, immediate and root causes and required reforms. Based on these HSDAs, pilot projects were prepared for Haiti, Grenada, St. Lucia, and Dominica. These HSDA pilot projects were completed during the reporting period.

² Project was extended to June 2012

³ This includes funds managed by UNDP as well as UNEP

⁴ Reflects what was expended for UNEP only up to June2012

Component 3 - Policy, Legislation, and Institutional Reform

57. This component sought to reform and realign national policies, legislation and institutional structures to reflect the objectives of IWCAM and to capture the requirements of the more pertinent regional and international MEAs. The LBS Protocol is among these MEAs. The project allocated resources towards meeting with Cabinet members for example in Grenada and Dominica and re-drafting of legislation or other policy documents and Cabinet notes, in support of ratification of MEAs, such as the LBS protocol of the Cartagena Convention. Funding was also provided to support legislative drafting.
58. Model IWRM policies were prepared for Antigua and Barbuda and Dominica, while a number of other countries such as Barbados, Cuba, and the Dominican Republic, have demonstrated their commitment to adopt an IWRM approach. Community Based Resource Assessment (CBRA) Manual and tools were finalized, translated into Spanish and French, and promoted among participating countries.

Component 4 - Regional and National Capacity Building and Sustainability

59. Efforts continued to raise awareness of IWCAM as an approach. Regional activities included public awareness and outreach through preparation of quarterly newsletters, posters, brochures, bulletins, training and presentations at regional and international fora.
60. Stakeholder involvement was extensive throughout the Project, with the following examples noted:
In Jamaica, the Drivers River Stakeholders Group engaged stakeholders in East Portland through four sub-committees: Governance and Enforcement; Sanitation and Livelihoods; Environmental Monitoring; and Public Awareness. In the Dominican Republic, the Private Sector participated in an extensive survey of industrial practices in the Lower Haina River Basin, as well as identification and implementation of Cleaner Production Mechanisms planned for the short, medium and long-term. In Saint Lucia, the Watershed Management Committee, responsible for motivating and mobilizing the wider community to participate in several activities, took the initiative to transform itself into an NGO, the Trust for the Management of Rivers, to promote, implement, and ensure sustainability of the IWCAM approach after the project was finished. In Tobago, the Anse Fromager Ecological Environmental Protection Organization, a community group largely dedicated to clean-ups and fighting wild fires on the hills of the Courland Watershed became involved in all planning and execution activities for the Watershed's reforestation effort. In Saint Vincent, IWRM Community Pilot Projects in four communities - Chateaubelair, Greggs, Spring Village, and Vermont - worked to increase public awareness of watershed issues and implement activities aimed at mitigating water pollution while providing improvements to communal facilities.
61. Capacity building focused at the national and regional levels. Training in environmental monitoring and data handling continued for laboratory personnel based on needs identified. Laboratory Strengthening, networking and development was also supported. Such investments support the countries and ensure sustainability after the project ends. Additional training in Project Proposal writing was also conducted during the reporting period

Component 5- Project Management and Coordination

62. The Project Management Unit (PMU) continued its role as manager for the regional components of the project. The Project held its final Project conference 16 - 18 November 2011 and 6th and final Project Steering Committee Meeting 15 November, 2011 in Kingston, Jamaica. The project was approved for an extension until June 2012. The experiences, lessons learnt and achievements of more than five years of implementation were shared and reviewed by project partners and stakeholders. The public was invited to follow the proceedings via live webcast.
63. Implementing Agencies and Executing Agencies (IA/EA) Management Group met formally prior to the final Regional Project Steering Committee Meeting. All of the final outputs and reports of the

project can be downloaded from www.iwcam.org. This will be archived by UNEP CAR/RCU as host of the Clearing House Mechanism.

64. A terminal evaluation was conducted for the project as a standard requirement for the Global Environment Facility. A follow up project proposal (PIF) to the GEF IWCAM project has been developed and was submitted to the GEF CEO for approval in April 2012. The PIF entitled “Implementing Integrated Land, Water & Wastewater Management in Caribbean SIDS” was endorsed by ten (10) countries and was cleared by GEF CEO for inclusion in the June work programme. The detailed project proposal is expected to be submitted to the GEF Secretariat during the first quarter of 2013.

(iii) Testing a Prototype Caribbean Regional Fund for Wastewater Management (GEF CRew)

Background

65. The degradation of the Caribbean marine environment from the discharge of untreated wastewater is a serious concern for countries whose livelihoods depend on their natural marine resources. Numerous scientific studies, including UNEP/GPA’s 2006 report on the State of the Marine Environment and the Caribbean Sea Ecosystem Assessment (CARSEA) Study, found that “sewage pollution from land-based sources and from ships has been the most pervasive form of contamination of the coastal environment.”
66. While countries increasingly recognize the importance of improving wastewater management, obstacles exist to meeting the obligations of the LBS Protocol and taking such steps. UNEP GPA further reported in their 2006 Report that significant financial constraints exist and that there is a lack of adequate, affordable financing available for investments in wastewater management in the WCR.
67. In addition to financial constraints, other substantial barriers also exist. These include inadequate national policies, laws and regulations; limited enforcement of existing laws and regulations; poor communication and collaboration between various sectors and agencies which contributes to a fragmented approach to wastewater management; and limited awareness, knowledge and understanding of appropriate, alternative and low-cost wastewater treatment technologies. Other limitations in technical capacity (e.g., in developing project proposals, operating and maintaining treatment systems, and monitoring and analyzing wastewater discharges and impacts), constrain progress to effectively manage wastewater.
68. Based on the above, UNEP and IDB requested GEF assistance on behalf of the countries of the Wider Caribbean to improve the capacity of countries in wastewater management through the development of a prototype Regional Fund as a possible modality for providing sustainable financing for wastewater management projects in the region while also addressing key capacity constraints within existing legal, institutional, educational and policy frameworks for wastewater management.
69. The full project consists of five major components: Investment and innovative financing for wastewater management (IDB); Reforms for Wastewater Management (UNEP); Communications, Outreach and Information Exchange (UNEP); Monitoring and Evaluation (IDB/UNEP) and; Project Management (IDB/UNEP).

Objective(s)

70. The objectives of the project are: (1) to establish innovative, financing mechanisms for cost-effective and sustainable financing of wastewater management in the WCR; (2) to facilitate policy discussions, strengthen legislative frameworks; and (3) to facilitate regional dialogue and knowledge exchange among the key stakeholders in the WCR.

Expected Outcomes

71. The expected outcomes for this project are:

- Improved Access to financing for waste water management
- Successful development of pilot projects
- Improvements in technical capacity for project implementation
- Reduced land based pollution to terrestrial and coastal waters from untreated wastewater in pilot projects locations
- Improved stakeholder awareness about acceptable, sustainable and cost effective wastewater management solutions
- Increased interest and demands for Pilot Financing Mechanisms in the WCR
- Increased knowledge, dissemination of information and use of participatory methods and practices by government agencies, private sector and civil society on wastewater management in the WCR

Project Cost and Expenditure (in USD)

Project Period	Total Project Cost	Source of Funds	Total UNEP Budget	Projected Budget For Project (2012)	Actual Budget (2012)	Expenditure (2012)
2011-2012	20,000,000 ⁵	GEF	3,335,000	1,800,000	1,434,198 ⁶	251,760.16 ⁷

Beneficiary Countries

Regional: Antigua and Barbuda, Barbados, Belize, Costa Rica, Guatemala, Guyana, Jamaica, Panama, Saint Lucia, Saint Vincent and the Grenadines, Suriname, and Trinidad and Tobago

Full Project Breakdown

Budget per Component - Summary Table - FULL SIZE PROJECT: Testing a Prototype Caribbean Regional Fund for Wastewater Management (CReW)			
Project Budget			
Project Components/Sub-projects/Activities	GEF Funding USD: \$20 Million	Co-Financing USD: \$200 Million	Total Project Cost USD: \$220 Million
Component 1: Investment and Innovative Financing for Waste Water Management (IDB)	15,073,000	244,392,000	259,465,000

⁵ Does not include project preparation phase, indicates GEF funding only

⁶ Budget for UNEP component only

⁷ UNEP expenditures only up to June2012

Sub-project I.1: Investment and innovative financing for wastewater management (4 Pilots)	13,000,000	242,042,000	255,042,000
Sub-project I.2: Project Development Support	1,000,000	2,350,000	3,350,000
Sub-project I.3: Capacity Strengthening for Wastewater Pilots	1,073,000	0	1,073,000
Component II: Reforms for Waste Water Management (UNEP)	2,500,000	2,999,996	5,499,996
Sub-project II.1: Capacity Building - Policy and Institutional Strengthening	1,540,000	894,736	2,434,736
Sub-project II.2: Capacity Building - Legislative Reform	660,000	526,315	1,186,315
Sub-project II.3: Capacity Building - Awareness Raising	300,000	1,578,945	1,878,945
Component III: Communication, Outreach and Information Exchange (UNEP)	710,000	500,000	1,210,000
Sub-project III.1: Information Sharing and Dissemination	360,000	75,000	435,000
Subproject III.2: Integrated Information System	350,000	300,000	650,000
Component IV: Monitoring & Evaluation (UNEP/IDB) (UNEP – 90,000)	760,000	1,104,000	1,864,000
Sub-project IV.1: Monitoring & Evaluation	590,000	0	590,000
Sub-project IV.2: Financial & Operational Audits	170,000	0	170,000
Component V: Project Management (UNEP/IDB) (UNEP 35,000)	957,000	3,891,000	4,848,000
Sub-project V.1: Project Coordination	510,000	0	510,000
Sub-project V.2: Steering Committee	197,000	0	197,000
Sub-project V.2: Administrative Assistance	250,000	0	250,000
TOTAL PROJECT COST (\$)	20,000,000	252,886,996	272,886,996

Total Value of UNEP Executed Components: USD 3,335,000

Project Status

72. The following countries submitted formal letters of endorsement for this project through their GEF focal points: Antigua and Barbuda, Barbados, Belize, Costa Rica, Guatemala, Guyana, Jamaica, Panama, Saint Lucia, Saint Vincent and the Grenadines, Suriname and Trinidad and Tobago. The CReW project has four pilot countries Jamaica, Belize, Guyana, and Trinidad and Tobago.
73. A Project Implementing Form (PIF) was designed and cleared by the GEF CEO in September 2008 and subsequently approved by Council in November 2008. A Project Proposal Grant was received for the development of a full project proposal submission to the GEF in 2010.
74. RAC Cimab conducted missions to selected countries in October 2009 to collect baseline data on wastewater management, analyses. The Jamaican-based consultancy group, Sustainability Managers also compiled baseline data through regional investigations and correspondence with project countries. The Project Proposal was completed and was submitted to GEF CEO for approval. The Project received GEF CEO approval in November 2010. The project is a four year project managed and implemented by the Inter-American Bank and the United Nations Environment Programme. The Project had an implementation start date of January 2011 and scheduled for completion in December 2014. Due to an extended pre-inception phase that was needed to formalize the internalization of the project and the establishment of an agreement between UNEP and IDB, the project was considered to commence in June 2011 and for UNEP CAR/RCU in January 2012.

75. During the Project Inception Phase, the Project Coordinating Group (PCG) was established; a project website was developed (www.gefcrew.org), as well as a project logo, banner and brochure. The project participated in the 6th GEF Biennial International Water Conference, October 2011 in Dubrovnik Croatia. The GEF CReW Project held its Inception Workshop and First Steering Committee Meeting in February 2012 in Kingston, Jamaica. A detailed annual operations plan and revised budget for 2012 and Terms of Reference for the Steering Committee were approved. UNEP CAR/RCU with the support of a Communications Specialist (as a member of the PCG) and an Administrative Assistant will be responsible for executing Component 2-Reforms for Wastewater Management, and Component 3-Communication, Outreach and Information Exchange. The GEF CReW project participated in the 6th Biennial Caribbean Environmental Forum and Exhibition in May 2012 in St. Kitts and Nevis. The CReW booth had the exhibit titled "CReW- Treating Waste Water Right" The exhibit introduced the project and highlighted some of the issues affecting wastewater management in the Wider Caribbean Region. The project also participated in the 1st LBS STAC in Aruba, June 2012. The project will participate in the 21st Annual CWWA Conference and Exhibition in October, 2012.
76. Training and other capacity building needs of participating countries are being assessed. This information will inform the Baseline Assessments and training to be provided through CReW at regional and national levels. The PCG continues to work with the pilot project countries to develop their Pilot Financing Mechanisms and is working to finalize the agreement which will see the framework established for the development of the revolving fund.

B. Monitoring and Assessment

(iv) Assessment of Pollutant Loads and Sources in the Wider Caribbean Region

Background

77. In 1994, CEP concluded the first regional overview of land-based sources of pollution in the WCR (CEP Technical Report No. 33). As such, the overview data was more than fifteen years old and had limited value to CEP Governments as a current information source. A second overview was required to confirm or reconfirm priority source pollutants in the Wider Caribbean Region. This second overview was completed in 2011 resulting in Technical Report No 52 .The Update of CEP Technical Report No. 33 was carried out during the period 2005-2010 in two phases. The first phase involved the hosting of two workshops in Caracas and Havana in 2005 and 2006, respectively, dealing with Methodologies for Estimating Domestic and Industrial Pollutant Loads from land-based sources in WCR. The second phase entailed the assessment and analysis of National Technical Reports presented by Barbados, Belize, Colombia, Costa Rica, Cuba, French Guiana, Guadeloupe, Martinique, Guatemala, Jamaica, Nicaragua, Panama, Dominican Republic, Trinidad & Tobago, and Venezuela in addition to other information available up to 2009, to provide updates on the pollutant loads discharged in the WCR. This updated report provides an update of the domestic and industrial pollutant loads discharged in the WCR, sanitation coverage expansion and treatment, as well as the pollutant loading from watersheds inflows according to the available information in the WCR countries. It also presents the projected changes of pollutant loads for the years 2015 and 2020 in fulfilling UN Millennium Development Goals. During the last biennium other reports from projects involving monitoring and assessment including Know Why Network, and Baseline Analysis of Domestic Wastewater were produced.

Objective(s)

78. The objective of this activity is to build upon completed technical reports and utilize monitoring and assessment data and information generated during the last biennium including but not limited to the updated TR 33, AMEP Atlas and Know Why Network Final Project Report. These activities will also facilitate a coordinated approach to the capture, analysis and dissemination of data and information from ongoing pollution monitoring activities taking place under the GEF funded projects.

Expected Outputs

79. The expected outputs for this project include:
- Enhancement and Development of Mechanisms for sharing of Pollution Related Data and Information
 - Further development and improvement of the Interactive web based map
 - Development of Clearing House Mechanism and establishing linkages to existing clearing house mechanism
 - Production of Pollution Fact Sheets
 - Increased collaboration between CEP Secretariat, LBS RACs and Project partners or collaborating institution

Beneficiary Countries

Wider Caribbean Region

Project Cost and Expenditure (in USD)

Project Period	Total Project Cost	Source of Funds	Projected Budget (2010-12)	Actual Budget (2010-12)	Expenditure (2010-12)
2010-2012	45,000	U.S.A. Dept of State	45,000	45,000	31,000⁸

Status

80. The Secretariat and LBS RAC Cimab worked together to update CEP Technical Report # 33 with new components of analysis and updated country data. Following reviews by national representatives and members of AMEP's Regional Activity Network, the final draft report was submitted to the 5th LBS ISTAC and Fourteenth Intergovernmental Meeting on the Action Plan for the Caribbean Environment Programme (14th IGM). The updated report was adopted at the 14th IGM and Eleventh Meeting of the Contracting Parties to the Convention for the Protection and Development of the Marine Environment of the Wider Caribbean Region (11th COP) meeting in October 2010 in Montego Bay Jamaica. It was published as a new Technical Report; CEP Technical Report No. 52 in 2012.
81. RAC Cimab and the AMEP Secretariat also worked together to develop a wastewater brochure and fact sheets with information presented in recent technical reports including the updated TR33, Regional Wastewater Baseline Analysis and the Know-Why Network (KWN) Partnership Project.
82. The Secretariat established an Interim Working Group in accordance with Decision XI of the 14th IGM to continue work related to Environmental Monitoring and Assessment. The group used the new CEP Technical Report # 52 (Updated Technical Report No. 33) and other relevant studies as a baseline for identifying new activities to improve effluent reporting and assessment of water quality conditions throughout the Convention Area. Based on Country nominations, the working group consists of representatives from Jamaica (chair), Bahamas, Columbia, Mexico, Barbados, USA, Trinidad and Tobago and France with technical support from the LBS RACs – IMA and CIMAB. The AMEP Secretariat convened a Regional Experts Workshop on Environmental Monitoring and Assessment, in September, 2011 in Montego Bay, Jamaica. There were 41 participants including technical experts from 18 countries. This workshop enabled further discussions by the Interim Working Group. The report of the work of the Interim Working Group was presented at the 1st LBS STAC June 2012, Aruba.

⁸ Expenditures up to end of June 2012

83. A Regional Laboratory Capacity Database was developed during in the reporting period. This regional database will serve as a tool to assist persons in the region in locating laboratories that meet specific analytical needs and will be used in support of projects and activities implemented within the framework of the Cartagena Convention and its protocols. This database is based on results of a regional laboratory capacity survey that was distributed to 60 laboratories in 18 countries of the WCR. There were further improvements to the interactive project activity map with information on monitoring and assessment activities of AMEP and the GEF REPCar Project. The database is available as a printed document and as a searchable online data base on the UNEP CAR/RCU web site.

C. Wastewater Management

(v) Sewage Needs Assessment Pilot Projects

Background

84. Domestic Sewage and Wastewater is one of the largest sources of pollution by volume in the WCR. AMEP initiated a series of pilot Sewage Treatment Needs Assessment Projects. These pilot projects assisted countries in meeting the obligations of Annex III of the LBS protocol, provide regional guidance on the classification of water bodies under Annex III, and assist in the planning for the upgrade of existing systems. The pilot projects were preceded by the 2003 development of a Sewage Needs Assessment Guidance Document, published as CEP TR 44. The guidance document was developed to assist countries of the Wider Caribbean Region in the development of national and community action plans for improved wastewater management.
85. Previously completed pilot projects in support of Annex III of the LBS Protocol included those conducted in Whitehorses, Jamaica, Vieux Fort, Saint Lucia, Charlottetown, Tobago in collaboration with PAHO; a UNEP-DTIE supported project on Water and Sanitation in Breadnut Valley, Jamaica, as well as a Constructed Wetlands Project for the treatment of domestic wastewater in the Au Leons watershed of Saint Lucia. The Saint Lucia project was co-financed by GEF-IWCAM and the European Union. A joint UNEP/PAHO / Ministry of Health and Environment project to assess the status of wastewater treatment plants in Jamaica commenced in 2009 and continued through to the end of 2010.
86. Lessons learnt from these projects were disseminated, presented in past meetings, and used toward the development of new pilot projects. Following the successful completion of sewage needs assessment pilot projects in Tobago and Saint Lucia, funds were mobilized to conduct a similar assessment in Belize.

Objective(s)

87. The project aims to assist in the development of national plans for selected pilot countries to comply with the requirement of Annex III to the LBS Protocol with regards to domestic wastewater.

Expected Outputs:

88. The expected outputs of the project include:
- Implementation and completion of pilot project in Belize, according to agreed work plan;
 - Experiential Notes based on experiences of completed pilot project
 - Mobilization of funding for additional pilot projects

Beneficiary Countries- Belize

Project Cost and Expenditure (in USD)

Project Period	Total Project Cost	Source of Funds	Projected Budget (2010-11)	Actual Budget (2010-11)	Expenditure (2010-11)
2010-2011⁹	25,000	U.S.A Dept of State	25,000	25,000	21,360

Belize SSFA amount USD21, 360

Status (completed)

89. A joint UNEP/PAHO and Ministry of Health and Environment (MOHE) project to assess the effluent water quality of Jamaica's Sewage Treatment Plants commenced in 2009 was completed in 2010. It sought to assess the efficiency of the nations Sewage Treatment Plants. Three (3) Regional workshops were conducted to determine the number of Wastewater Treatment Plants (WWTPs). 171 Sewage Treatment Plants (STPs) were geo-referenced, 165 plants were sampled, 20 receiving waters were sampled and maps were created from sampling points. Maps of Jamaica representing the quality of the water for the different parameters were created. These maps represent a national view of the quality of the STP effluent.
90. The Project findings were presented at the 5th Caribbean Environmental & Exhibition Forum (CEF – 5) in Montego Bay, Jamaica in 2010. Eight (8) initial stakeholders and training meetings, Eight (8) Project committee meetings, One (1) committee meeting and four (4) regional meetings were held to discuss and assess the information gathered from the sampled plants.
91. During the reporting period, a Sewage Needs Assessment Pilot Project was completed in Caye Caulker, Belize in August 2011. The project investigated the waste management practices and ground water use in Caye Caulker. The sewage needs assessment was carried out through literature review, interviews with the stakeholders, questionnaires, public consultations, and data gathered from the implementation of a water quality monitoring programme. The samples were collected on a monthly basis for a period of one (1) year. The sample locations identified were selected to obtain best representative data of the area. Eight (8) wells were monitored and the parameters analyzed included BOD5, COD, total and fecal coliform, ph, dissolved oxygen, turbidity, sulphates, salinity, phosphates and nitrates.
92. The lessons learnt from both of these projects were used in the development of the full sized project proposal for the GEF CREW project.

D. Waste Management

(vi) Implementation of Regional Action Plan on Marine Litter (RAPMaLi)

Background

93. According to the resolution, "Oceans and the Law of the Sea" (A/59/L.22 adopted as Resolution 59/25), paragraph 92, it is recommended that the consultative process during deliberations on the report of the

⁹ No budgeted activity for 2012

Secretary General, should organize its discussions around issues such as marine debris. Within this context, and considering the context of UNEP’s support to CAR/RCU, bearing in mind that marine litter is a priority activity for both CAR/RCU and for UNEP’s Regional Seas Programme, RSP will continue to support and assist CAR/RCU in the environmental protection and sustainable development of the WCR through the implementation of the “Regional Action Plan on the Sustainable Management of Marine Litter in the Wider Caribbean” (RAPMaLi).

94. UNEP’s Regional Seas Coordinating Office and the Global Programme of Action (GPA) have embarked on the development of a “Global Initiative on Marine Litter” this initiative concentrate on the establishment and development of pilot regional activities in regions that are most affected. The initiative provides a global platform for the establishment of partnerships, co-operation and co-ordination of activities for the control and sustainable management of marine litter. At the Fifth International Marine Debris Conference, co-organized by the UN Environment Programme (UNEP) and the US National Oceanic and Atmospheric Administration (NOAA), in March 2011 the Honolulu Commitment was endorsed. The Honolulu Commitment expressed concern at the continued threat and economic costs from marine debris to human health and safety; biodiversity and ecosystem services; sustainable livelihoods; and the boating, shipping, tourism and fishing sectors. The Honolulu Strategy a framework for a comprehensive and global effort to reduce the ecological, human health, and economic impacts of marine debris was finalized after the conference.

Objective(s)

95. The objective of this project is to assist in the environmental protection and sustainable development of the WCR through the implementation of the “Regional Action Plan on Marine Litter Management” (RAPMaLi), finalized in 2007.

Expected Outputs

The expected outputs of the project are:

- A Regional Project Proposal for implementing a Region-wide Education and Outreach Programme for the Management of Solid Wastes and Marine Litter.
- Targeted education and awareness material on marine litter for four pilot countries
- Resource Mobilization Strategy

Beneficiary Countries

Regional – Barbados, Saint Lucia, Jamaica, Guyana

Project Cost and Expenditure (in USD)

Project Period	Total Project Cost	Source of Funds	Projected Budget (2010-12)	Actual Budget (2010-12)	Expenditure (2010-12)
2010-2012	40,000	US Dept of State	40,000	20,000	10,000

Status

96. Interns of the AMEP sub-programme compiled available information on the existing educational and awareness material in the Wider Caribbean Region. A consultant was contracted to develop targeted education and awareness material on marine litter for four pilot countries. However based on the

feedback received from countries as well as the ongoing efforts to develop the Honolulu Strategy and a Global Initiative on Marine Litter it was agreed to delay this activity so that it could be further informed by these activities.

97. The AMEP Secretariat will be developing a Marine Litter Activity Guide and an online Interactive Game on Marine Litter for the Children's page of the CEP website to support the implementation of the Caribbean Regional Action Plan for Marine Litter in early 2012. Activities will focus on the development of targeted educational, promotional and awareness material for children, decision makers and the general public.

E. National Programmes of Action

(vii) Implementation of Pilot NPAs

Background

98. The 1995 Global Programme of Action for the Protection of the Marine Environment from Land-Based Activities (GPA) calls on governments to develop NPAs in order to reverse the decline in coastal and marine environments from land-based pollution and degradation. These NPAs incorporate dynamic and iterative processes that institutionalize the phased implementation of priority activities within a cross-sectoral participatory framework. The main purpose of an NPA is to develop concrete projects that mobilize both stakeholders and resources. NPAs therefore need to be mainstreamed into relevant budgetary, policy and planning frameworks.
99. The development of a common vision for growth and development within a given area is hindered by fragmentation of governmental authorities and the competing interests of all sectors (governmental, agricultural, development, tourism, community, NGOs). NPA projects demonstrate the viability of using a collaborative approach for the development and implementation of NPAs based on an integrated planning approach tailored to country needs. These projects provide coordinating support to the regional partnership between UNEP-CAR/RCU, the GPA Secretariat and the GPA Node of NOAA which is aimed at facilitating the development of NPAs in the WCR. This partnership allows for more effective use of resources, both financial and human, to refine existing models and guidelines for the preparation of NPAs. The lessons learnt from successfully completed projects are disseminated through regional workshops to promote replication and increase national and regional institutional capacity to implement NPAs within national development agendas.
100. Projects build upon lessons learnt from previously completed pilot projects for the development of NPAs in Jamaica, Saint Lucia, and Barbados. A CEP technical report on lessons learnt from the Caribbean NPA process was completed and made available online.

Objective(s)

101. The overall goal of the project is to build capacity in CEP countries for the development and implementation of NPAs to assist in the protection of the Caribbean marine environment from pollution entering from land-based sources and activities. Specific objectives of this phase were to:
 - a) Assist in mobilizing resources and partners (including the private sector) for the implementation of specific projects for NPAs already developed;
 - b) Assist countries in the development of financial strategies and the promotion of public-private partnerships, which can be used to develop and implement selected projects; and

- c) Facilitate the development and implementation of NPAs or similar strategies and action plans in other member countries.

Expected Outputs

102. The expected results of the project include:

- Implementation of pilot NPA projects in Saint Lucia, Suriname and Trinidad and Tobago
- Assessment of willingness and capability of additional countries to develop an NPA
- Support to willing countries with an initial assessment of ongoing or planned policies, expenditure, legislation and other activities that meet the objectives of the GPA
- Development of full scale NPAs, including pilot projects, in selected countries;
- Sharing of experiences and best practices

Beneficiary Countries

Wider Caribbean Region with focus on countries that have completed and/or commenced development of NPAs.

Project Cost and Expenditure (in USD)

Project Period	Total Project Cost	Source of Funds	Projected Budget (2010-12)	Actual Budget (2010-12)	Expenditure (2010-12)
2010-2012	528,200	UNEP GPA	528,200	518,200 ¹⁰	500,700 ¹¹

Status

103. During the reporting period AMEP with support from UNEP GPA contracted a consultant to research the success of the Mainstreaming of National Programmes of Action (NPAs) in the Caribbean and to present as Caribbean Case Studies. This document was completed in 2011 and published as a new CEP Technical Report No. 60.
104. UNEP GPA and UNEP CAR/RCU, in collaboration with the Ministry of Planning, Housing and the Environment of Trinidad and Tobago, launched the pilot project entitled Ecosystem Management for the Integrated Land and Seascape of Northern Trinidad,” that seeks to integrate the strategies identified in their NPA in 2009/2010. This project was completed in 2010. LBS RAC IMA provided support to the project by way of preliminary planning and facilitation of communication with community groups and supporting agencies.
105. An NPA pilot project for Suriname was agreed upon between UNEP and Suriname’s Ministry of Labour, Technological Development and Environment. The NPA pilot project entitled Eco-Sanitation Toilets and the Mitigation of the Sipaliwini River commenced in 2010 and was successfully completed in 2011. The project was initiated through a joint UNEP CAR/RCU and NOAA mission to the country as well as a national workshop on NPA development. Outputs of the project included; Construction of 35 Urine Diverting Dry toilets (UDDT) in the villages Godo / Solang Asidonhopo and Akisiamau;. Fifteen (15) UDD toilets were constructed in Godo, two (2) UDD toilets were constructed in Asidonhopo and eighteen

¹⁰ (2010-11) USD 345,000 (Trinidad & Tobago - GPA); USD 81,800 (Saint Lucia GPA); 21,400 (Suriname) (2011-12) USD 20,000 (Suriname); USD 35,000 (Saint Lucia) ;USD 15,000 (Dominican Republic)

¹¹ Expenditures up to June 2012

(18) were constructed in Akisiamau. Nine (9) trainers were trained and awareness raising activities were conducted in the villages of Godo/Solang, Djumu, Bendekondre, Palulubasu, Asindo Opo, and Akisiamau. Water samples from drinking water stations in the villages of Bendekondre, Asindo Opo and Akisiamau were collected and analyzed.

106. During the present and upcoming biennium, UNEP CAR/RCU and UNEP GPA will continue to build national capacity to develop and/or implement NPAs in the WCR. In 2011 new NPA pilot projects were developed in Saint Lucia, Dominican Republic and Suriname. The NPA project in Suriname involves a baseline analysis of the quality of water in the Suriname River. The NPA Project in Saint Lucia involves mainstreaming Saint Lucia's National Plan of Action through a North West Coast Water Quality Demonstration Project. The NPA project for the Dominican Republic will develop outreach and education material on land-based sources of marine pollution and promote integration and implementation of the NPA with local and national authorities, main stakeholders, and coastal communities.

F. Climate Change and Disaster Risk Reduction

(viii) Climate Change Adaptation and Disaster Risk Reduction in Jamaica

Background

107. The Jamaican economy is heavily dependent on the country's natural environment and in particular upon its coastal and marine resources. Terrestrial, coastal and marine ecosystems are likely to be further adversely affected by the continued impact of climate change. For example, watersheds¹², already facing degradation from inappropriate land use, farming practices and settlement development, are likely to face increased flooding and landslides from more frequent and intense rainfall. In like manner, the degradation of coastal and marine ecosystems such as coral reefs, sea-grasses and mangroves¹³ which act as natural buffers is expected to be exacerbated as a result of storm surges and sea-level rise unless adequate and timely interventions are made. Combating these problems requires a systematic approach including strategies that (i) indirectly reduce vulnerability to climate change; (ii) directly address vulnerability to extreme weather events through disaster risk reductions programmes; and (iii) mainstreaming climate change into sectoral plans and national policies.
108. Intrinsic in these priority areas is building resilience of coastal and marine ecosystems. However, the Government's programme for climate change adaptation and mitigation is being hampered by numerous constraints; chief among them is an inadequate capacity to undertake climate change mitigation and adaptation strategies. This project focuses on improving climate change adaptive capacity in selected terrestrial and coastal ecosystems; institutional strengthening; and awareness building, all geared towards helping Jamaica, particularly vulnerable groups, to be better prepared to cope with the potential impacts of climate change which include natural disasters.
109. The proposed intervention supports the Global Climate Change Alliance in ACP regions and countries. In September 2007, the European Commission launched the Global Climate Change Alliance (GCCA) between the European Union and poor developing countries most vulnerable to climate change¹⁴. The

¹² 10 of the 26 watersheds are severely degraded.

¹³ 30% of mangrove forests are lost and this contributes to increased vulnerability of coastal areas including settlements and civil infrastructure

¹⁴ Communication on Building a Global Climate Change Alliance (GCCA) between the European Union and poor developing countries most vulnerable to climate change – COM(2007)540 final, and July 2008 Staff working Document on the implementation of modalities of the GCCA

GCCA intends to step up cooperation between the EU and the developing countries that are most vulnerable and have the less capacity to react.

Objective(s)

110. Increase resilience and reduce risks associated with natural hazards in vulnerable areas as adaptive measures to climate change, thereby contributing to the sustainable development of Jamaica

Expected Outputs

111. The expected outputs of the project are:

Rehabilitated watersheds through slope stabilization measures such as reforestation of denuded hillsides;

- Three Local Forest Management Committee Staff (LFMCs) established and/or strengthened
- 300 hectares of land in Watershed Management Units (WMUs) reforested
- All forested crown lands assessed and a geo-referenced database of crown lands developed
- 2,600 hectares of Forest Reserves in Forest Management Areas declared
- Forest Fire Management Programme developed
- Sustainable livelihoods/economic activities promoted as alternatives to current unsustainable practices
- River protection structures established

Increased resilience of selected coastal areas against potential climate change impacts;

- Improved database for monitoring changes in coastal ecosystems
- Re-established sand dunes and replanted mangroves in degraded coastal regions
- A management plan for marine protected areas (MPAs) developed and delineated activity zones in three MPAs;
- Established and enhanced coastal protection measures/structures in selected areas
- Restored sea grass beds/areas
- Alternative livelihoods identified, assessed for feasibility and grants awarded for development of these livelihoods

Climate change capacity building and awareness raising.

- Climate change campaign
- Data-sharing mechanism established
- Policy and institutional review conducted
- Capacity needs of the government sector (climate change adaptation and disaster risk reduction) identified and interventions made to address priority needs
- One public education (pilot) project conducted
- One risk and vulnerability assessment conducted

Beneficiary Countries

Jamaica

Project Cost and Expenditure (in USD)

Project Period	Total Project Cost	Source of Funds	Projected Budget (2010-2012)	Actual Budget (2010-12)	Expenditure (10-12)
2010-2012	5,621,343.00¹⁵	EU	2,987,912.6	2,695,935.00	1,565,440.37¹⁶

Project Status

Project Management

112. The project received approval from the European Union in October 2010 and a Project Steering Committee (PSC) was established for the Project in November 2010. The Project Management Unit (PMU) was established within the offices of the PIOJ and a Project Cooperation Agreement was signed in February 2011 between UNEP and the PIOJ for the first year of the implementation of the project.
113. There were delays in the start up of the project due to time taken to develop and approve contracts between all project partners. There were also administrative delays in the transfer of funds after contract agreements were signed. The project also had challenges with procurement, due to lengthy procedures and this contributed to the low expenditure rate

Rehabilitated watersheds

114. Under the project two (2) Local Forest Management committees (LFMC) were established and launched in Dallas Castle and Constitution Hill in January. Consultations are advanced for the establishment of the third LFMC in Hyde Hall/Sawyers, Trelawny. Reforestation of selected Watershed Management Units is progressing; 231 hectares of the targeted 300 hectares have been replanted. This achievement is above the projected target for Year 1 of the project.
115. The selection and initial description of 2600 hectares of crown land to be declared as forest reserves was completed; efforts are underway in having these declared forest reserves. Assessments have been completed for 66,444.63 hectares of the 110,000 hectares of forested crown lands; 9 out of 21 permanent sample plots established a geo-referenced database of the crown lands is to be developed
116. There were various site visits conducted that allowed members of the PSC to be aware of the work being carried out by the Forestry Department. The Forestry Department will be partnering with the United States Forest Service (USFS) towards the development of a Forest Fire Management Programme.

¹⁵

The total project cost reflected is the actual dollar amount or cash contribution from the EU. The total project cost includes in-kind contribution from UNEP and the Government of Jamaica (GOJ), (~€ 180,420) from UNEP and € 172,000 from the Government of Jamaica (GOJ). Total project cost including UNEP and GOJ contribution equals € 4,482,420 or USD 6'101'022. Exchange rate as noted in UNEP & EU contract agreement 1 EURO=1.3611 USD

¹⁶ Expenditure up to June 2012

Increased Resilience in Coastal Areas

117. Earth Resource Data Analysis System software was acquired under the project and will be utilized in the development of a database for monitoring changes in coastal ecosystems. Mona Informatics was contracted to develop the database and it is expected that aspects of the ecosystems database will be achieved over the next eleven (11) months.
118. 10,000 Red and Black Mangrove Seedlings were acquired and will be utilized in the planting of mangroves in degraded coastal areas. Mangrove restoration activities have begun in Portland Cottage (Portland Bight). 3000 red and black mangrove seedlings have been planted to date. Adjustments were made to existing hydrological regime by creation of a tidal channel to craft more suitable conditions for growth and survival of mangrove plants. Sea grass training for fifteen (15) participants was conducted October 2011 for the restoration of sea grass beds at selected Marine Protected Areas (MPAs). Baselines surveys were completed for St. Thomas, Refuge Cay, Negril, Montego Bay and a Wetland Restoration Ecologist was consulted on the suitability of the sites based on reconnaissance findings. Fifteen (15) Mooring Buoys and 15 Manta Ray Anchor systems were procured and are to be installed. Public Consultations were held at the Montego Bay Marie Park to assess alternative livelihood needs of local fishermen within the park who will be affected by the Zoning of the MPA. A community sensitization session was done in Negril, the session was coordinated by the Negril Environment Protection Trust (NEPT) and was used as a medium to highlight the climate change adaptation solutions for Negril.
119. Thirty (30) Data loggers were installed in Negril, Montego Bay, Ocho Rios and Portland Bight for gathering sea surface temperature data. A site visit was conducted to Montego Bay to illustrate rotation of the data loggers to members to the Project Steering Committee.
120. Site selection was finalised for rehabilitation of Sand Dunes at Long Bay Beach Negril and at Font Hill, Westmoreland. The Shorelock Technology Methodology was selected for Sand dune/beach restoration.

Capacity Building

121. A scoping mission was carried out in the Negril area to examine the possibility of conducting a land based risk and vulnerability assessment. A training session was conducted in December 2011 in the Risk and Vulnerability Assessment Methodology with key stakeholders as well as sensitization workshop with individuals from key Government Agencies.
122. The project launched a public awareness campaign for Climate Change in March 2012. The implementation of the campaign has started, and various awareness raising activities have taken place across the island.
123. A project website was also developed and is being maintained by UNEP CAR/RCU as part of its in-kind support to the project.

G. Other Related Partnership Initiatives:

(ix) Other Related Partnership Initiatives

124. During the reporting period a partnership was developed with the University of Indiana towards the facilitation of University students as interns for the AMEP Sub-programme. Three interns from the University were placed within relevant projects of the AMEP sub-programme. Partnership was also developed with the U.S. Peace Corps in Jamaica. This partnership involves Marine Litter activities, Beach Clean ups, and review of environmental education material.

125. The AMEP Secretariat continues to collaborate with IMO through ongoing activities by RAC REMPEITC. A Regional Training Workshop on the Compliance, Monitoring and Enforcement of the Ballast Water Management Convention was held in Kingston, Jamaica in November 2011 within the framework of the GEF-UNDP-IMO GloBallast Partnership Project. This workshop provided baseline training for flag state inspectors and port state control officers in regards to the implementation and enforcement of the Ballast Water Management Convention. There were 39 participants from 23 countries of the Wider Caribbean Region. In April 2012 RAC REMPEITC convened the 3rd Regional OPRC Forum on Oil Spill Prevention, Preparedness, and Response in the Gulf of Mexico and the Caribbean. There were 40 participants who included 20 delegates, experts and observers. The Second Regional Task Force Meeting on the Ratification and Implementation of the IMO Convention on Ballast Water Management was convened in April 2012. The meeting was held in Trinidad and Tobago, with 18 delegates representing 7 countries of the WCR being present.
126. GEF International Waters: Learning Exchange and Resource Network (GEF IW:Learn) project focuses on enhancing communications and information sharing between GEF projects. In March 2012 UNEP CAR/RCU finalized an Agreement with United Nations Office for Project Services (UNOPS) for the third phase of the project. IW:Learn3 seeks to strengthen global portfolio experience sharing and learning, dialogue facilitation, targeted knowledge sharing and replication in order to enhance efficiency and effectiveness of GEF IW initiatives. UNEP CAR/RCU will be executing a component “Regional Learning for Latin America and the Caribbean”. Activities include, Training Workshops, Project-Project Learning Exchanges. The first workshop “First Latin America and the Caribbean (LAC) Targeted Regional Workshop for GEF IW Project” was convened during the 6th Biennial Caribbean Environmental Forum in May 2012 with support of the AMEP Secretariat. During the workshop, representatives of the participating GEF IW projects presented on their project status, achievements, challenges, lessons learnt, and best practices. There were also discussions on possible project twinning to allow for exchange and sharing of information between IW projects to facilitate capacity building. There were also discussions on ideas for future workshops.
127. UNEP CAR/RCU collaborated with the UNEP Division of Early Warning and Assessment (DEWA) on the Risk and Vulnerability Assessment Methodology (RIVAMP) training in Jamaica in 2011.

ANNEX1: Summary of responses to recommendations of the 5th LBS ISTAC and relevant decisions of the 14th IGM of the Cartagena Convention by the AMEP Secretariat

RECOMMENDATIONS OF 5th LBS ISTAC and 14th IGM (2010)	STATUS OF IMPLEMENTATION (2010-2012)
<p>Recommendation I</p> <p>1. The Secretariat focus its promotional efforts on countries who request specific assistance in facilitating their ratification process and to continue to use communication tools to demonstrate the benefits of the LBS Protocol to Member Governments;</p> <p>3. The Secretariat enter into discussions with the Government of the United Kingdom in order to assist the British Overseas Territories in the Caribbean in their intention to ratify the LBS Protocol</p>	<ul style="list-style-type: none"> • During the reporting period promotional efforts included the WCR LBS Collage Competition. A letter was sent out to all focal points to inquire on any assistance needed in LBS ratification process. Requests were also made to countries through the AMEP quarterly. The LBS Collage Competition was completed. This completion raised awareness of the LBS Protocol and its entry into force. Further promotion facilitated through IWCAM, REPCar and CReW projects. LBS Banner and a 2012 Calendar were produced • This is ongoing, discussions held with the national and LBS focal points of the US to provide additional assistance.
<p>Recommendation II</p> <p>2. The secretariat consider the development of multi-focal area projects for submission to GEF to maximize funding opportunities</p>	<ul style="list-style-type: none"> • This is ongoing, two new GEF Project Proposals were developed - follow up to GEF REPCar and GEF IWCAM: Input was provided to Global Nutrients Project now under full proposal development.
<p>Recommendation III</p>	

<p>3. The Secretariat assist RAC Cimab in the finalization of the report by facilitating communication with countries, preparing information boxes for TR33 as suggested by the Ad-Hoc Working Group and elaborating on the report's conclusions</p> <p>4. The Secretariat, jointly with the countries, compile an inventory of monitoring programmes in the region; existing laboratory and human capacities; and, the identification of methodologies modeling and criteria to perform water quality monitoring, with the aim of adopting standardized methodologies for monitoring and reporting of pollutant loads in the development of future regional pollutant data bases.</p> <p>5. The Secretariat explore opportunities for integrating the results of TR33 and other recently completed projects (Know-Why Network, GEF Contaminated Bays, Baseline Assessment on Wastewater Management) into the development of new initiatives focused on monitoring and assessment</p>	<ul style="list-style-type: none"> • Assistance was provided to RAC Cimab for the finalization of the report. • A Laboratory Capacity Database was produced. • This is ongoing. Facts Sheets integrating results of TR33, Know-Why Network, Baseline Assessment on Wastewater were completed. New Technical Reports were prepared.
Recommendation V	
<p>1. The Secretariat, jointly with the LBS/RACs, continue to build capacity in the use of GIS, Remote Sensing and other decision-making tools and to use these tools to bring added value to the outputs of existing environmental monitoring data being generated by AMEP Projects and activities.</p> <p>2. The Secretariat incorporates oceanographic studies, where appropriate to assist in mapping the potential movement of pollution through the Wider Caribbean Region.</p> <p>3. The Secretariat incorporate epidemiological studies, as appropriate, to highlight human health linkages relating to scientific data and information generated by AMEP projects and activities that could assist in mobilizing additional funding for the sub-programme</p>	<ul style="list-style-type: none"> • Support provided through GEF IWCAM Clearing House Mechanism (CHM). New GIS Project Concept prepared but no funding was mobilized. GEF IWCAM products prepared; Promoted use of RIVAMP and links established with UNEP GRID. IWCAM GIS Atlas developed. • No further action taken due to lack of resources. • No further action taken due to lack of resources.
Recommendation VI	

<p>1. The economically-feasible options for wastewater treatment in heavily urbanized areas be further explored and that information about the most appropriate technologies be disseminated to the Parties.</p> <p>2.The Secretariat seek to strengthen and/or establish new partnerships with regional banking associations and international development banks to promote the need for the provision of adequate financing for wastewater treatment and to provide information on the impacts of wastewater.</p>	<ul style="list-style-type: none"> • This is ongoing under the GEF CReW Project and through the new GEF CReW Website. Material from the GEF CReW project development phase was compiled and published as new technical reports; Other wastewater technology options were circulated. Clearing House is under development as part of the implementation of the GEF CReW Project.. • This is ongoing through the development and co-implementation of the GEF CReW Project with IDB: CDB is a member of Project Steering Committee (PSC) for the CReW Project.
<p>Recommendation VII</p>	
<p>2.The Secretariat deepen linkages between the work of the SPAW and AMEP sub-programmes through existing and future activities, as well as their respective RACs so that a more comprehensive picture is available on pollutant load, contaminant levels in sediments, water and selected biota and the overall impact on coastal and marine biodiversity, ecosystem services and human health</p> <p>3.Secretariat continue its efforts to organize meetings of the LBS ISTAC so that approval of the work plan and budget takes place prior to the commencement of the next biennium of work</p> <p>6.In the development of new GEF and other projects, the Secretariat builds on the outputs of earlier projects and activities, focuses on areas or gaps that were not addressed and expands to include countries that did not benefit directly from earlier project’s interventions</p> <p>7. The Secretariat continue to incorporate the issue of Climate Change as feasible in the design of new project activities and in particular with activities dealing with watershed management</p>	<ul style="list-style-type: none"> • Marine Litter collaboration implemented as part of the development of a Marine Litter online educational game. • These efforts are being continued with the convening of the 1st LBS STAC in 2012 • New GEF Project was developed to build on the outputs of the earlier projects GEF REPCar and GEF IWCAM. GEF CReW project was designed taking account of the outputs of earlier projects. • This is ongoing; the Secretariat has incorporated the issue of Climate Change into new GEF Projects and in the EU funded Climate Change Adaptation and Disaster Risk Reduction for Jamaica. Collaboration was established with other regional climate change projects in Belize and the OECS.

<p>8.The Secretariat work with interested countries to identify sources of technical assistance and funding for solid waste management</p> <p>9. The Secretariat, where appropriate, include capacity building for solid waste management within ongoing or new projects and activities</p>	<ul style="list-style-type: none"> • This work is being done through the Marine Litter Regional Action Plan; Honolulu Strategy; GPA and Regional Seas- Global Partnerships on Waste and Marine Litter: • This is ongoing through the implementation of the Marine Litter Regional Action Plan; Honolulu Strategy; GPA and Regional Seas- Global Partnerships on Waste and Marine Litter
Recommendation VIII	
<p>1. The Secretariat continues to strengthen its relationship with regional agencies in an effort to better develop RACs and RANs for the LBS Protocol</p>	<ul style="list-style-type: none"> • The Secretariat continued to strengthen relationships with regional agencies involved in ongoing and new projects such as INVEMAR, CEHI, RAC IMA, RAC CIMAB
Recommendation IX	
<p>1. Collaboration between the Protocols of the Cartagena Convention and the programmes of CEP be reinforced to facilitate synergy between the efforts undertaken by different groups of experts.</p> <p>2. New projects that include assessments of environmental status, e.g. monitoring of pesticide residues, complement their activities with the evaluation of the impact on ecosystems, protected species as well as human health.</p>	<ul style="list-style-type: none"> • Possible efforts were identified through new Marine Litter Project on developing awareness tools linking AMEP and SPAW. • This has been incorporated into the new GEF Project proposals with input of Pan American Health Organization (PAHO) and the Food and Agricultural Association (FAO). PAHO is also expected to be a key partner in the implementation of the GEF CReW project
Recommendation X	

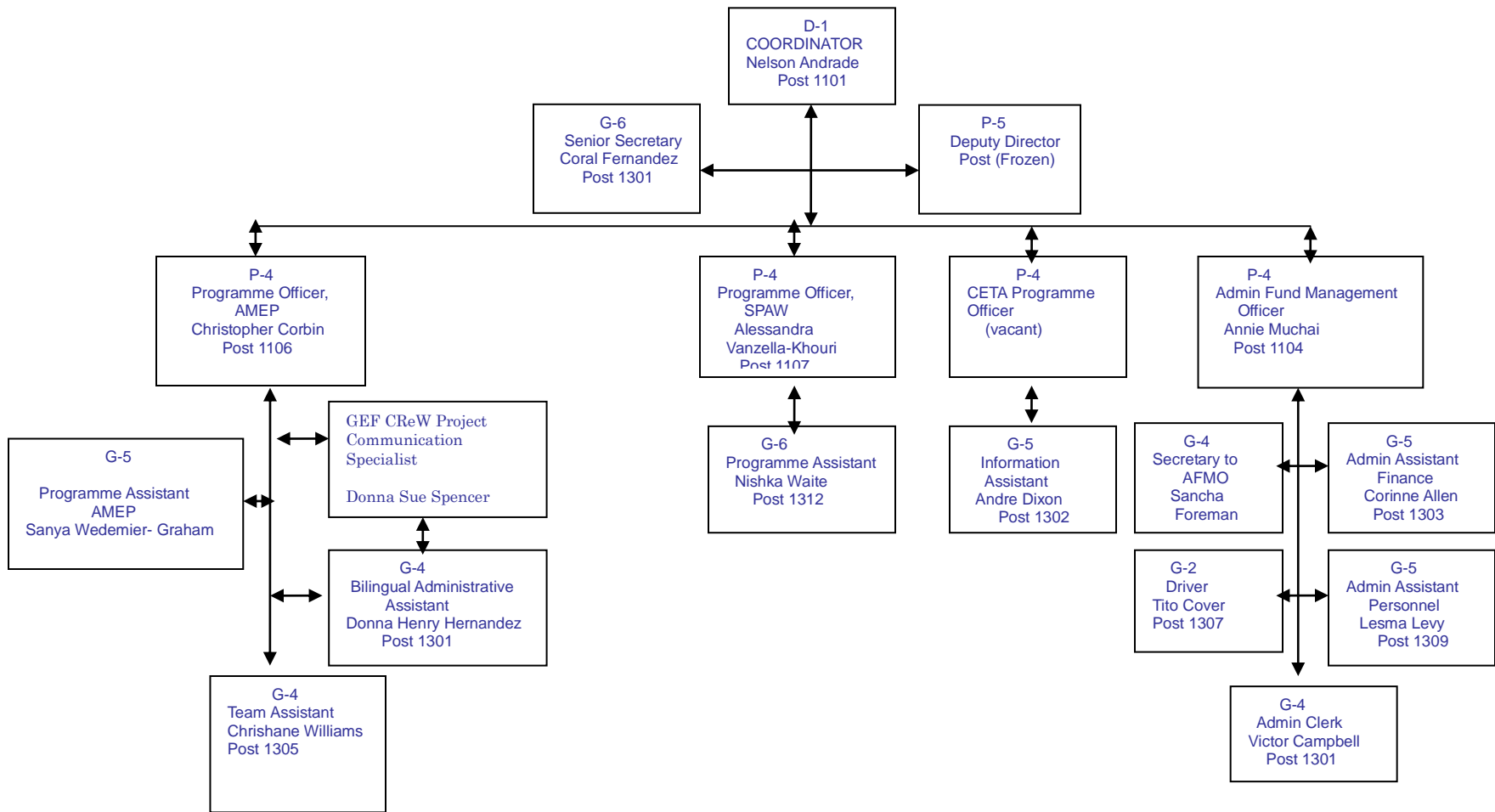
<p>3. The use of the UNEP-CEP Regional Seas platform be expanded for further legal and institutional capacity-building related to the London Protocol;</p> <p>5. Implementation of the London Convention/Protocol be strengthened at the regional and national levels through the Regional Seas platform;</p> <p>6. Inter-agency co-operation be increased, both nationally and internationally, to prevent and reduce marine pollution from land-based sources;</p> <p>7. Application of the ‘ecosystem approach’ be encouraged for activities under the London Convention/Protocol, the LBS Protocol and other relevant arrangements.</p> <p>10. Costa Rica, Grenada, and Haiti be encouraged to accede to the MARPOL Convention;</p> <p>11. The CEP Secretariat continue its collaboration with the International Maritime Organization in the further development and implementation of projects and activities within the framework of the Cartagena Convention and its Protocols.</p>	<ul style="list-style-type: none"> • No further action at this time • No further action at this time • Collaboration ongoing with IMO , Regional Workshop held by RAC REMPEITC in Jamaica with financial support and presentation/participation by AMEP Secretariat • The RIVAMP Methodology, which promotes the ecosystem approach is being replicated through NPA pilot projects • Regional workshops and other opportunities are used to promote ratification • Work continues through RAC- REMPEITC GIS Mapping activity and the GloBallast Project
<p><i>Decision III</i></p>	
<p>10. Encourage GEF/UNDP/IMO GloBallast Partnerships, RAC/REMPEITC-Caribe and IMO’s ITCP to continue cooperating in the framework of the CEP</p> <p>11. Request the Secretariat not to include the CATREC project proposal as part of the 2010-2011 Work Plan but to use it as a background document that could assist in identifying opportunities to strengthen the capacity of RAC/REMPEITC and as a basis for discussing with other partners the broader training needs for the Wider Caribbean Region in Oil and Hazardous Chemicals Spills Planning and Response.</p>	<ul style="list-style-type: none"> • Regional Training Workshop on the Compliance, Monitoring and Enforcement of the Ballast Water Management Convention was convened by RAC REMPEITC in 2011. • The CATREC project proposal was removed from the 2010-2012 Work Plan
<p><i>Decision IV</i></p>	
<p>1. Request the Secretariat, in coordination with the Regional Activity Centres, to finalize outstanding Host Agreements with RAC Host Governments</p>	<ul style="list-style-type: none"> • Final Drafts of Host Agreements were completed and under consideration by Host Governments. Updates on progress to be provided at 1st LBS STAC.

<p>Decision VII</p> <p>4. Adopt the draft reporting template for the Cartagena Convention and its Protocols, taking into account the observations and inputs provided by the Meeting, including the need to ensure accurate use of terminology in the three languages;</p> <p>5. Request the Secretariat to seek resources to improve national capacity in the delivery of reliable reporting, through training workshops and the development of guidelines to guide Parties in using the template;</p> <p>6. Further request the Secretariat to continue its efforts to strengthen collaboration with regional agencies and relevant Convention Secretariats to enable more effective implementation of the Caribbean Environment Programme Work Plan;</p>	<ul style="list-style-type: none"> • Reporting Template finalized and will be used for reporting at the 15th IGM • No resources were mobilized for this activity, effort will be made in 2012 to develop reporting guidelines using internal resources at the Secretariat • This is ongoing, partnerships were developed with the EU, IDB, University of Indiana, Peace Corps; Secretariats of the Stockholm, BASEL, and Rotterdam Conventions. Enhanced collaboration with the IMO through activities in support of the Globallast Project, Ballast Water, MARPOL and London Dumping Conventions;
<p>Decision VIII</p> <p>1. Welcome the efforts by the Secretariat to develop new proposal concepts for funding by the GEF and request that the support of governments to the further development of these proposals and their implementation in the region be communicated as appropriate to the GEF Secretariat; and</p> <p>2. Request the Secretariat to ensure that new projects, including GEF Projects, build further on the experiences of ongoing projects and activities.</p>	<ul style="list-style-type: none"> • Countries were actively encouraged to endorse GEF Projects • This is being carried out in the development of new GEF Project proposals that will build on the successes of the GEF REPCar and IWCAM Projects while the new GEF CreW project was informed by previous work on wastewater management in the Wider Caribbean Region
<p>Decision X</p> <p>1. Request the Secretariat, along with the Regional Activity Centres, to continue to strengthen partnerships with national, regional and international agencies and initiatives, in areas of relevance to the Cartagena Convention and its Protocols;</p> <p>3. Request the Secretariat to continue close collaboration with SAICM and other Chemicals-related Conventions, to enhance cooperation and coordination, including the development and implementation of Chemicals Projects within the Wider Caribbean Region;</p>	<ul style="list-style-type: none"> • This is ongoing, partnerships have been developed and are being strengthened with several national, regional and international agencies. • Secretariat participated and made presentations at regional SAICM Meetings, and held coordinating meetings with UNEP Chemicals and the Stockholm Convention Secretariat

<i>Decision XI</i>	
<p>1. Request the Secretariat to continue its work on the production, management and dissemination of data and related products generated by the Caribbean Environment Programme, or that supports the objectives of the Caribbean Environment Programme, with the assistance of its sub-programme for Communication, Education, Training and Awareness (CETA);</p> <p>2. Adopt Caribbean Environment Programme Technical Report No. 33, subject to any additional edits received from Contracting Parties no later than 15 November 2010;</p> <p>3. Establish an Interim Working Group to continue work related to monitoring and assessment that could use Technical Report No. 33 as a baseline document; with the goal to improve effluent reporting and assessment of water quality conditions throughout the Convention Area as will be required under the LBS Protocol and;</p> <p>4. Request the Secretariat to identify resources for convening regional technical meetings as part of the 2010-2011 Work Plan in support of this work</p>	<ul style="list-style-type: none"> • Various materials were produced and disseminated such as fact sheets, newsletters, summary sheets. There were also activities such as the LBS Collage Competition, the printing of an LBS Banner and publication of a 2012 CEP Calendar which was disseminated widely in the region. • This was completed and published as a new CEP Technical Report # 52 • An Interim Working Group was established based on country nominations, monthly conference calls were held. and a Regional Workshop convened in September 2011. • This has been done through GEF Projects and bilateral assistance from donors and partnerships

ANNEX II: Organizational chart of the Secretariat of the Caribbean Environment Programme

UNITED NATIONS ENVIRONMENT PROGRAMME (UNEP)
 CARIBBEAN REGIONAL COORDINATING UNIT (CAR/RCU)



ANNEX III: Status of the Ratification of the Cartagena Convention and its Protocols

State	Cartagena Convention		Oil Spill		SPAW		LBS	
	Date of Signature	Ratified / Acceded	Date of Signature	Ratified / Acceded	Date of Signature	Ratified / Acceded	Date of Signature	Ratified / Acceded
<i>Antigua and Barbuda</i>		11-Sep-86		11-Sep-86	18-Jan-90			13-July - 10
<i>Bahamas</i>		24-Jun-10		24-Jun-10		8-Mar-12		24-Jun-10
<i>Barbados</i>	5-Mar-84	28-May-85	5-Mar-84	28-May-85		14-Oct-02		
<i>Belize</i>		22-Sep-99		22-Sep-99		4-Jan-08		4-Feb-08
<i>Colombia</i>	24-Mar-83	3-Mar-88	24-Mar-83	3-Mar-88	18-Jan-90	5-Jan-98	2-Oct-00	
<i>Costa Rica</i>		2-Aug-91		2-Aug-91			6-Oct-99	
<i>Cuba</i>		15-Sep-88		15-Sep-88	18-Jan-90	4-Aug-98		
<i>Dominica</i>		5-Oct-90		5-Oct-90				
<i>Dominican Republic</i>		24-Nov-98		24-Nov-98		24-Nov-98	3-Aug-00	
<i>France</i>	24-Mar-83	13-Nov-85	24-Mar-83	13-Nov-85	18-Jan-90	5-Apr-02	6-Oct-99	4-May-07
<i>Grenada</i>	24-Mar-83	17-Aug-87	24-Mar-83	17-Aug-87		5-Mar-12		5-Mar-12
<i>Guatemala</i>	5-Dec-83	18-Dec-89	5-Dec-83	18-Dec-89	18-Jan-90			
<i>Guyana</i>		14-Jul-10		14-Jul-10		14-Jul-10		14-Jul-10
<i>Haiti</i>								
<i>Honduras</i>	24-Mar-83		24-Mar-83					
<i>Jamaica</i>	24-Mar-83	1-Apr-87	24-Mar-83	1-Apr-87	18-Jan-90			
<i>Mexico</i>	24-Mar-83	11-Apr-85	24-Mar-83	11-Apr-85	18-Jan-90			
<i>Netherlands</i>	24-Mar-83	16-Apr-84	24-Mar-83	16-Apr-84	18-Jan-90	2-Mar-92	6-Oct-99	
<i>Nicaragua</i>	24-Mar-83	25-Aug-05	24-Mar-83	25-Aug-05				
<i>Panama</i>	24-Mar-83	7-Oct-87	24-Mar-83	7-Oct-87	16-Jan-91	27-Sep-96		9-Jul-03
<i>St. Kitts and Nevis</i>		15-Jun-99		15-Jun-99				
<i>Saint Lucia</i>	24-Mar-83	30-Nov-84	24-Mar-83	30-Nov-84	18-Jan-90	18-May-00		30-Jan-08
<i>St. Vincent and the Grenadines</i>		11-Jul-90		11-Jul-90	26-Jul-91	26-Jul-91		
<i>Suriname</i>								
<i>Trinidad and Tobago</i>		24-Jan-86		24-Jan-86	18-Jan-90	10-Aug-99		28-Mar-03
<i>United Kingdom</i>	24-Mar-83	28-Feb-86	24-Mar-83	28-Feb-86	18-Jan-90			
<i>United States of America</i>	24-Mar-83	31-Oct-84	24-Mar-83	31-Oct-84	18-Jan-90	16-Apr-03	6-Oct-99	13-Feb-09
<i>Venezuela</i>	24-Mar-83	18-Dec-86	24-Mar-83	18-Dec-86	18-Jan-90	28-Jan-97		
<i>European Economic Commission</i>	24-Mar-83							

Annex IV: Intergovernmental, Technical /Expert and Other Major Meetings convened by UNEP CAR/RCU, RACs and GEF Project (2010-2012)

Event Number	Programme Area	Title	Venue	Date	Partners	No. of Participants	Representatives/Countries
1.	AMEP	Fifth Meeting of the Interim Scientific, Technical and Advisory Committee (ISTAC) to the Protocol Concerning Pollution from Land- Based Sources and Activities in the Wider Caribbean Region	Panama, City, Panama	May 24-28 th , 2010		44 (including observers but not including CAR/RCU staff)	23 Countries WCR NGO, IGO
2.	AMEP	Fourteenth Intergovernmental Meeting on the Action Plan for the Caribbean Environment Programme and Eleventh Meeting of the Contracting Parties to the Convention for the Protection and Development of the Marine Environment of the Wider Caribbean Region	Montego Bay, Jamaica	October 6-9, 2010		54 (including observers but not including CAR/RCU staff)	21 Countries WCR IGOs, NGOs
3.	AMEP	Regional Workshop “The Win-Win: Achieving National and Sectoral Development Priorities through the use of Environmental Outlooks and Improved MEA Implementation”	Paramaribo, Suriname	March 28, - April 1 2010	UNEP ROLAC, GEF IWCAM, ISSD, CARICOM		
4.	AMEP	Regional Experts Workshop on Environmental Monitoring and Assessment	Montego Bay, Jamaica	September 26-30, 2011	GEF IWCAM	41	18 Countries WCR
5.	AMEP	First Latin America and the Caribbean(LAC) Targeted Regional Workshop for GEF IW Project	St. Kitts and Nevis	May 21-25, 2012	GEF IW:Learn3	14	GEF IW project Managers WCR
6.	AMEP	First Meeting of the Scientific, Technical and Advisory Committee (STAC) to the Protocol Concerning Pollution from Land-Based Sources and Activities in the Wider Caribbean Region	Oranjestad Aruba	June 5-7, 2012		46	Government representatives Countries WCR, NGOs

7.	RAC Cimab	National Workshop to review and update legislation related water management/ National -Level Workshop in Support of Legislative Review and Reform to Promote Integrated Watershed and Coastal Areas Management	Cuba	October 30-1 November, 2011	CIGEA		
8.	RAC-REMPEITC	National Workshops on the Development of ESI maps -Phase I	Dominica	January 25-29, 2010	Government of Dominica	24	Government representatives Countries WCR and NGOs
9.	RAC-REMPEITC	National Workshops on the Development of ESI maps Phase II	Dominica	March 15-19, 2010	Government of Dominica	18	Government representatives Countries WCR and NGOs
10.	RAC-REMPEITC	5 th Ordinary Steering Committee Meeting	Curacao Netherlands Antilles	May 11-12, 2010	IMO	23	Government representatives Countries WCR, and NGOs
11.	RAC REMPEITC	Regional Workshop on Anti Fouling Systems (AFS) convention	St. Lucia	June 29-30, 2010	IMO	29	8 Caribbean Countries, Government Agencies
12.	RAC-REMPEITC	Regional Workshop on Ratification, Implementation, and Enforcement of the MARPOL Convention Annex 1 & V for Caribbean Countries	Kingston Jamaica	October 27-28, 2010	Maritime Authority of Jamaica, IMO	19	7 Caribbean Countries
13.	RAC-REMPEITC	Regional Workshop on Compliance, Monitoring and Enforcement of the Ballast Water Management Convention,	Kingston, Jamaica.	November, 2010	Government of Barbados, IMO		
14.	RAC-REMPEITC	National Workshops on the Development of ESI maps-Phase I	Barbados	April 3-8, 2011	IMO	22	National Government agencies
15.	RAC-REMPEITC	National Workshops on the Development of ESI maps-Phase II	Barbados	July 4-8, 2011	IMO	21	Private Organizations, National Gov agencies
16.	RAC-	Regional Training Workshop on the	Kingston,	November	IMO, UNDP	39	23 Countries

	REMPEITC	Compliance, Monitoring and Enforcement of the Ballast Water Management (BWM) Convention	Jamaica	14-15 , 2011			from the Wider Caribbean Region (WCR),NGOs
17.	RAC-REMPEITC	National Oil Spill Contingency Planning Workshop	Aruba	November 16-18, 2011	Crisis Management Office of Aruba, UNDP	25	Government agencies Private
18.	RAC-REMPEITC	Regional OPRC Seminar on Developing National Plans for Marine Pollution Preparedness and Response Related to Offshore Units and Regional Cooperation	Nassau, Bahamas	December 7-9 2011	IMO, USA, government of the Bahamas	25	Governments, NOAA, USCG,IADC, EPA
19.	RAC-REMPEITC	National Oil Spill Contingency Planning Workshop	St. Maarten	February 13-14, 2012	Crisis Management Office of Aruba , UNDP	18	Government Agencies,
20.	RAC-REMPEITC	National Oil Spill Contingency Planning Workshop	Anguilla	February 15-17, 2012	Crisis Management Office of Aruba, UNDP	38	Government Agencies
21.	RAC-REMPEITC	Regional OPRC Seminar on Oversight of offshore Units	Willemstad, Curacao	January 31-2 February 2012	IADC, IMO	23	Governments
22.	RAC-REMPEITC	Third Regional OPRC Forum on Oil Spill Prevention, Preparedness and Response in the Gulf of Mexico and the Caribbean	Jamaica	April 11-13, 2012	IMO	39	Government Ministry representatives WCR
23.	RAC-REMPEITC	2nd Ballast Water Management Regional Task Force Meeting,	Trinidad and Tobago	April 17-18, 2012	IMO	18	
24.	RAC-REMPEITC	6th Steering Committee Meeting	Curacao	May 9-10, 2012	IMO	19	US Coast Guard, Countries WCR, NGOs
25.	RAC-IMA	National Consultation for the UNEP/IMA ProEcoServ Programme for the	Trinidad and Tobago	December, 2010			

		Caura/Tacarigua Watershed					
26.	RAC -IMA	Workshop “Integrated Coastal Watershed and Water Resource Management “	Trinidad and Tobago	January 27-28, 2011	CEHI		
27.	GEF REPCar	4th Coastal Monitoring Meeting	Managua, Nicaragua	March 15-16, 2010		17	Colombia, Costa Rica and Nicaragua
28.	GEF REPCar	Second Demonstration Project Meeting	San José, Costa Rica	December 8-10, 2011		22	Colombia, Costa Rica and Nicaragua
29.	GEF REPCar	5 th Coastal Monitoring Meeting	Jamaica	April 14-15 2011		13	Colombia, Costa Rica and Nicaragua
30.	GEF REPCar	Fifth Project Steering Committee Meeting	Cartagena, Columbia	June 29-30, 2011		61	Colombia, Costa Rica and Nicaragua
31.	GEF REPCar	Regional Final Results Workshop	Catagena, Columbia	July 1, 2011		21	Colombia, Costa Rica and Nicaragua
32.	GEF -IWCAM	National Symposium on Integrated Water Resource Management	Jamaica	February 2010	CEHI, Ministry of Water and Housing Jamaica		
33.	GEF -IWCAM	Workshop on Effective Proposal Writing	Trinidad and Tobago	April 2010		36	Government and NGOs
34.	GEF -IWCAM	Fifth GEF IWCAM Regional Technical Advisory Group (RTAG) Meeting	Jamaica	June 28-29, 2010		19	12 Countries WCR
35.	GEF -IWCAM	SIDS IWRM Methodology Workshop		August 24-26, 2010			
36.	GEF -IWCAM	GEF IWCAM Workshop on Coastal Aquifer Management in Small Islands Developing States	St. Kitts	October 2010	FAO, UNESCO	35	12 WCR Countries UNESCO, UNU
37.	GEF -IWCAM	GEF IWCAM Fifth Regional Steering Committee Meeting	Trinidad	November 11, 2010		19	11 WCR countries
38.	GEF -IWCAM	GEF IWCAM Bio-indicators Seminar for Tropical Aquatic Systems in Martinique	Martinique	December 2010			

39.	GEF -IWCAM	Integrated Coastal, Watershed and Water Resource Management	Trinidad and Tobago	January 27-28, 2011	CEHI		
40.	GEF -IWCAM	GEF IWCAM –Clearing House Mechanism GeoNetwork Opensource and Metadata Training	Jamaica	February 16-18, 2011	CEHI	15	CEHI, Cimab, NEPA, IMA, MALFF St. Lucia, CZMU Barbados
41.	GEF -IWCAM	Train the Trainers Workshop in Community Based Resource Assessment (CBRA)	Dominica	April 12-14, 2011	CEHI, IMA	37	Representatives of 12 Countries WCR, CEHI, NGOs
42.	GEF -IWCAM	GEF IWCAM Second Training Workshop on Proposal Writing	Antigua & Barbuda	March 7-10, 2011		29	Representatives 13 WCR countries
43.	GEF -IWCAM	Training in Environmentally Sound Management of Laboratory Chemicals for Regional Lab Managers; Regional Laboratory Managers' Meeting (towards a Regional Network of Environmental Laboratories)	St. Lucia	March 8 - 10, 2011; March 11, 2011	CEHI		10 WCR countries (Antigua, Barbados, Bahamas, Tobago, St. Kitts, Nevis, Jamaica, Grenada, St. Vincent, Dominica, St. Lucia)
44.	GEF -IWCAM	Regional Media Workshop: "Communicating for Better Understanding of Our Watersheds and Marine Resources"	Trinidad & Tobago	17-19 May, 2011	CLME, ACM		
45.	GEF -IWCAM	Environmental Impact Assessment Review Workshop	St. Lucia	June 7-9, 2011		31	13 WCR countries
46.	GEF -IWCAM	Water Information Systems Expert Planning and Development Workshop	St Lucia	June 7-10, 2011	CEHI		
47.	GEF -IWCAM	3 rd Annual Water Operators Conference	Antigua	July 4-6, 2011	CWWA		
48.	GEF -IWCAM	GEF -IWCAM- Final Project Conference	Kingston, Jamaica	16-18 November, 2011			

49.	GEF -IWCAM	GEF -IWCAM- 6th Steering Committee Meeting	Kingston, Jamaica	15 November , 2011		26	10 WCR countries, UNOPS, GEF, UNDP , SOPAC
50.	GEF CReW	Project Launch and First Project Steering Committee Meeting	Kingston Jamaica	February 7-8, 2012	IADB	90	Government representatives WCR, NGO, IADB

ANNEX V: Documents Published by UNEP CAR/RCU, RACs and GEF Projects (2010-2012)

1. GEF CReW 2011. Brochure: Caribbean Regional Fund for Wastewater Management -Sustainable Financing for Environmentally Sound and Cost-Effective Wastewater Management Solution. (English)
2. GEF IWCAM 2010. Community Based Resource Assessment Tool (CBRA Toolkit). (English)
3. GEF IWCAM 2011. Public Education Brochure: Water is life .(English)
4. GEF IWCAM 2011. Public Education Brochure: Going for Green- Water in Agriculture .(English)
5. GEF IWCAM 2011. Public Education Brochure: Water and Industry -how an integrated approach can make a difference. (English)
6. GEF IWCAM 2011. Public Education Brochure: Finding a Balance- Tourism and Water Management. (English)
7. GEF IWCAM 2011. Integrating Watershed and Coastal Areas Management- Final Project Conference Summary. (English)
8. GEF IWCAM 2012. “How to” Manual Series: Recreational Water Quality Monitoring: An Introduction. (English)
9. GEF IWCAM 2012. “How to” Manual Series: Rainwater Harvesting (RWH) Made Easy. (English)
10. GEF IWCAM 2012. “How to “Manual Series: Constructed Wetland Wastewater Treatment Systems Made Easy.(English)
11. GEF IWCAM 2012. “How to” Manual Series: Scientific Diving: An Introduction. (English)
12. GEF IWCAM 2012. “How to” Manual Series: Vermiculture Made Easy. (English)

13. GEF IWCAM 2012. IWCAM GIS Atlas. (English)
14. GEF REPCar 2011. GEF REPCar Final Project Report - “Improving the Management of Agricultural Pesticides in Colombia, Costa Rica and Nicaragua” Experiences of the GEF- Reducing Pesticide Run-off to the Caribbean Sea Project. (English and Spanish)
15. GEF REPCar 2011. GEF REPCar Recommendations of Final Project Steering Committee Meeting. (English and Spanish)
16. GEF REPCar 2012. Agricultural Pesticide Residues in Caribbean Coastal Waters. Columbia, Costa Rica and Nicaragua 2008-2011.(English and Spanish)
17. UNEP CEP and Cimab 2011: Wastewater Brochure: Caribbean Sea without domestic wastewater. (English, Spanish)
18. UNEP CEP and Cimab 2011. Fact Sheet: Baseline Analysis on Domestic Wastewater Management in the Wider Caribbean Region. (English and Spanish)
19. UNEP CEP and Cimab 2011.Fact Sheet: Environmental Quality of Marine Ecosystems in High-Risk Areas in the Wider Caribbean Region. (English and Spanish)
20. UNEP CEP and Cimab 2011.Fact Sheet: Update of the Pollutant Loads Discharged in the Wider Caribbean Region (WCR). (English and Spanish)
21. UNEP CEP 2011: Laboratory Capacity Survey Report. (English)
22. UNEP CEP and Cimab 2011: CEP Technical Report 52: Domestic and Industrial Pollutant Loads and Watershed Inflows in the Wider Caribbean Regions (Update of Technical Report no. 33) (English, Spanish, French)

23. UNEP CEP 2012: CEP Technical Report 53: Assessment and Management of Environmental Pollution Atlas. (English, Spanish, French)
24. UNEP CEP and CReW 2012: CEP Technical Report 54: Profiles of Wastewater Management in Wider Caribbean Countries. (English)
25. UNEP CEP and Cimab 2012: CEP Technical Report 55: Baseline Analysis on Domestic Wastewater Management in the Wider Caribbean Region. (English)
26. UNEP CEP 2012: CEP Technical Report 56: Guidelines for the Collection, Preparation and Analysis of Organic Contaminants in Environmental Samples: (Water, Soil/ Sediments, and Biota). (English and Spanish)
27. UNEP CEP and IWCAM 2012: CEP Technical Report 57: Integrating Watershed and Coastal Areas Management: Indicators Mechanism & Capacity Assessment Part 1. (English)
28. UNEP CEP and IWCAM 2012: CEP Technical Report 58: Integrating Watershed and Coastal Areas Management: Indicators Mechanism & Capacity Assessment Part 2. (English)
29. UNEP CEP 2012: CEP Technical Report 60: Mainstreaming National Programmes of Action in the Wider Caribbean Region. (English)
30. UNEP CEP 2012: CEP Technical Report 61: Mainstreaming National Programmes of Action in the Wider Caribbean Region: Summary. (English)
31. UNEP CEP 2012 and CReW: CEP Technical Report 62: Caribbean Regional Fund for Wastewater Management: Wastewater Management in the Wider Caribbean Region: Knowledge, Attitudes and Practices Study (KAP). (English)
32. UNEP CEP and CReW 2012: CEP Technical Report 63: Caribbean Regional Fund for Wastewater Management: Wastewater Management Technologies in the Wider Caribbean Region.(English)

33. UNEP CEP and CReW 2012: CEP Technical Report 64: Caribbean Regional Fund for Wastewater Management: Gap Analysis and Regional Best Practices in Wastewater Management. (English)
34. UNEP CEP and CReW 2012: CEP Technical Report 65: Caribbean Regional Fund for Wastewater Management: International Best Practices in Wastewater Management. (English)
35. UNEP CEP and CReW 2012: CEP Technical Report 66: Caribbean Regional Fund for Wastewater Management: Situational Analysis.(English)
36. UNEP CEP and Cimab 2012: CEP Technical Report 67: Final Report of Regional Network in Marine Science and Technology for the Caribbean: Know Why Network.(English)
37. UNEP CEP and IWCAM 2012: CEP Technical Report 68: Toolkit for Institutional, Policy and Legislative Improvements in Support of the IWCAM Approach in the Caribbean SIDS. (English)
38. UNEP CEP 2012: Assessment and Management of Environmental Pollution (AMEP) Summary Sheet. (English)