

MMM Class of 2009-2010

The 09-10 MMM class are undertaking internships in a wide variety of agencies this summer in Halifax/Dartmouth, Joggins/Amherst, Moncton, Ottawa, and Malaysia. They are also working hard on their graduate projects and are looking forward to the 4th annual "Making Waves" Graduate Project presentations day which will take place on Tuesday August 24.

Joseph Collins

Joseph is interning at the Quality Health and Safety Department of Atlantic Towing LTD in Dartmouth Nova Scotia. His project is looking at the potential for shipbrokers to have a role in the development and growth of sustainable shipping. Dick Hodgson, MAP Adjunct Professor is his academic supervisor.

Mairi Edgar

Mairi is spending her internship with the Department of Fisheries and Oceans in the Oceans and Coastal Management Division under the guidance of Paul Macnab. She is reviewing the proposed amendments to Marine Mammal Regulations in the Fisheries Act with the aim to provide government agencies and commercial operators with sufficient



Mairi Edgar with Paul Macnab at the Bedford Institute of Oceanography.

guidance and regulation to manage whale-watching activities in an ecologically sustainable manner.

Mairi will identify gaps in the regulations and make recommendations. In addition, Mairi will examine educational outreach programs for pleasure boaters to increase their awareness around responsible whale watching. Elizabeth De Santo, Assistant Professor in Marine Affairs, is Mairi's academic supervisor.

Jessica McCluney

Jessica is interning with the Cumberland Regional Economic Development Association in Amherst, NS. She is spending the summer interviewing local community members to obtain their feedback on the community engagement and participation during the process of inscribing the Joggins Fossil Cliffs to the UNESCO World Heritage list. This study will serve as an initial exploratory evaluation to share lessons learned with other rural, coastal communities trying to designate protected or World Heritage sites. Her academic supervisor is John Kearney, MAP Adjunct Professor.

Paul Kendrick

Paul is interning with the Maritime Services Directorate of the Canadian Coast Guard (CCG), Maritimes Region. His intern host is Mr. Mike Voigt, the Director of Maritime Services. The major project he is undertaking with his placement is to provide the Director with an up to date business case on the services provided by that directorate for internal CCG usage. This includes identifying, collecting and collating metrics from each of the program superintendents that describe levels of service delivered and illustrate how these are serving CCG major stakeholders. This work will be used to showcase challenges and innovations of the Maritimes

MARK YOUR CALENDAR MAKING WAVES

August 24, 2010 – The 2009-2010 MMM students will present the results of their graduate project research. Plan to attend to learn more about the interested and varied MMM projects of this year's class. Details of location and time will be sent soon.

25th Anniversary of MAP

In 2011, MAP will celebrate 25 years of marine management education, research and service to the global coastal and oceans community. Plans are underway to recognize the significant achievements of all who have been involved from the beginning: faculty, staff, students and alumni. Watch for news on activities planned for anniversary events.

We are looking for your MAP memories: pictures, poems, prose, videos, yearbooks, etc. Please arrange to send to Becky at MAP as soon as possible.

Are you connected to LinkedIn, the business oriented social networking site? Or a member of the Dalhousie Marine Affairs Program MMM Facebook Group? Join today to get connected with other alumni of MAP

Region's area of responsibility to CCG's senior management team. Hugh Williamson, MAP Adjunct Professor, is providing the academic supervision.

Erin Mutrie

Erin is doing her internship with the Nova Scotia Chapter of the Canadian Parks and Wilderness Society (CPAWS-NS), a non-profit environmental organization, under

the guidance of Rodrigo Menafrá (MMM 2000). Her project examines the opportunities that stakeholders have to participate in the planning and management of federal Marine Protected Areas in Canada. Her research includes a comparative analysis of established MPAs, as well as a case study in Digby Neck and Islands where Erin will be conducting surveys to determine the community's familiarity, acceptability and interest in participating in the management of a potential Marine Protected Area in the region. Erin is being supervised by one of MAP's Professors, Elizabeth De Santo.

Tun Min Poh

Min is working with Lawrence Kissal, the head of the Marine Resource Management Branch of the Department of Fisheries, Sabah, Malaysia. Her internship involves speaking to officers within the Department of Fisheries and NGOs relating to the illegal trade of Humphead wrasse, *Cheilinus undulatus*, an endangered coral reef fish. The output of Min's internship and graduate project will be a recovery strategy for this species in the context of Sabah, Malaysia. Jeffery Hutchings, professor of Biology at Dalhousie, is her academic supervisor.

Dan Pujdak

Dan Pujdak is working as a junior policy analyst in the environmental stewardship unit of the Assembly of First Nations in Ottawa. His research examines the relationship between fishery co-management and historical themes of identity in Quebec. His project focuses on the James Bay North Quebec Agreement and the fishery management regime in the James Bay region. His academic supervisor is Richard Apostle, Professor of Sociology at Dalhousie.

Julie Whalen

Julie is spending her internship placement at Fisheries and Oceans Canada in Moncton, NB under the guidance of Ray MacIsaac in the Integrated Management unit. She is working as an integrated management coordinator of the Gulf Region, and has received many opportunities to attend inter-

departmental meetings and conferences throughout the summer. The placement has provided a practical learning experience with integrated management in coastal and ocean habitat, and provides the resources and connections to conduct field work and interviews for her graduate project. The project explores the governance of the Canadian Shellfish Sanitation Program and community, and seeks a proactive approach to environmental stewardship of land-based pollution using shellfish closures as an indicator of environmental health. Dr. Cathy Conrad, Professor, Geography Department, St. Mary's University, is Julie's academic supervisor.

Sarita Williams-Peter

Sarita is an international student, Nippon-funded scholarship recipient, from Saint Lucia. Her internship is with the Marketing Services Division of the Nova Scotia Department of Agriculture under the guidance of



Sarita Williams Peter at the CATCH Nova Scotia Seafood festival held in Halifax in June.

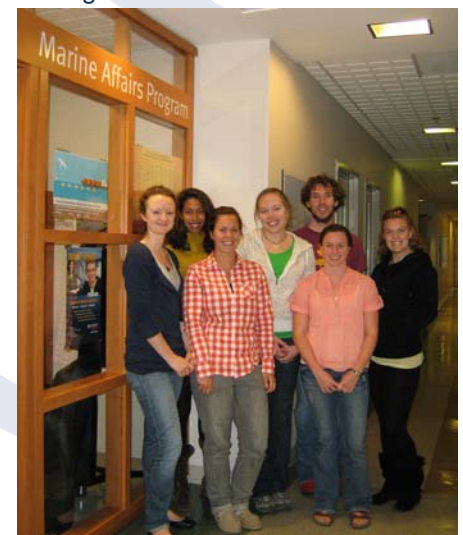
Scott Hosking, Director of Marketing Services and Jamey Coughlin, Select Nova Scotia Coordinator. Her graduate project will examine the institutional mechanisms for the participation of fishers in the fish marketing system in four countries: Belize, Grenada, Saint Lucia and Nova Scotia, Canada. Using the indicators transparency, accountability, and meaningful participation, she will assess the fish marketing system at the macro, meso and micro level. The results of the assessment will be used to develop best practices and recommendations for the institutions in Saint Lucia. Dr. Anthony T. Charles, Professor at Saint Mary's

University, is Sarita's academic supervisor.

International Youth Internship Program (IYIP)

Dalhousie University has received funding from the Canadian International Development Agency IYIP program for the project "Preparing Young Canadians to Successfully Contribute to the Needs of a Shrinking World". Over the next 3 years MAP will place 35 interns in Belize, Colombia, Grenada, Jamaica, St. Vincent and Uruguay. The internships are designed to support the overseas partners' efforts to achieve effective national and regional coastal management and ocean governance.

The first group of interns began their internship journey in Halifax in late May with orientation sessions before departing for their respective internship placements. Marina Winterbottom (MMM 2007) will work in Belize at the Caribbean Regional Fisheries Mechanism as the Marine Resource Management Assistant. Her work will focus on a review of the spiny lobster fishery. Katie Campbell is at IOCARIBE, the regional subcommission of the Intergovernmental Oceanographic Commission (IOC) of UNESCO in Cartagena, Colombia as the Integrated Coastal Area Management Assistant. Katie will



IYIP Interns: front (l to r): Marina Winterbottom and Katie Campbell; back (l to r): Katherine Card, Robin Ramdeen, Jen Wilson, Don McCrimmon and Danielle Fallon.

provide technical support for the application of watershed modeling tools and best management practices in agricultural activities for the mitigation of contaminant influx to coastal zones in the Caribbean region. Don McCrimmon is also at IOCARIBE, working as the Global Ocean Observing Assistant. He will be coordinating the development or project proposals and provide technical support in the development of the IOCARIBE-GOOS project. Jen Wilson was headed for Jamaica to work at the IOCARIBE office but has been re-directed to Cartagena due to the recent unrest in Kingston. Jen's role as the Capacity Building Assistant is to identify education opportunities to build research capability in marine sciences in the region as well as preparing reports, working papers and other documentation for the IOC in the Caribbean and Latin America. Robin Ramdeen is the Marine Protected Area Management Plan Assistant on Carriacou Island, Grenada. She will provide support to and assist with strengthening the capacity of the Carriacou Environmental Committee as well as the Carriacou and Petit Martinique Water taxi Association. Katherine Card will work on Union Island, St. Vincent as the Marine Protected Area Management Plan Assistant. On Union Island Katherine will work with 7 small NGOs to assist with ongoing participatory planning, plan implementation and monitoring using The Nature Conservancy Institutional Self-Assessment process. Danielle Fallon is at the Universidad de La Republica as the Integrated Management Program Assistant. Danielle will provide support to the recently established Master's degree program.

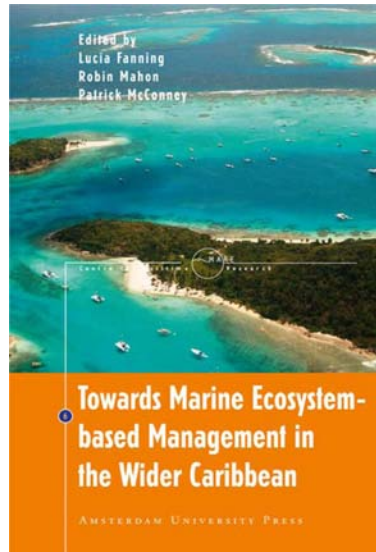
PROGOVNET News

Book Publication

Fanning, L., Mahon, R. and McConney, P. (Eds.), 2010. *Towards Marine Ecosystem-Based Management in the Wider Caribbean*. Amsterdam University Press, Amsterdam, 368 pp.

The volume brings together the knowledge and experience of scholars and practitioners within the Wider Caribbean to begin the

process of assembling a road map towards marine ecosystem-based management for the region. It also provides stakeholders and policy actors in each of the world's large marine ecosystems with a comparative example of the challenges and information needs required to implement principled ocean governance. The book follows on the work highlighted at the regional symposium held in Barbados in December 2008 (see MAP Matters March 2009).



Training

The International Ocean Institute (IOI-Canada) Training Module: Law of the Sea and Principled Ocean Governance – “Strengthening Principled Ocean Governance Networks – Transferring Lessons from the Caribbean to the Wider Ocean Governance Community” took place on May 17-21, 2010 at the Solutions Centre, University of the West Indies, Barbados. This module was specifically designed for the Caribbean region and was led by Dr. Winston Anderson, Dr. David Berry and Professor Ralph Carnegie, scholars at the Caribbean Law Institute Centre (CLIC), University of the West Indies (UWI). Additional support and lectures were provided by faculty at the Centre for Resource Management and Environmental Studies (CERMES) at UWI, Dalhousie's Marine Affairs Program and the Schulich School of Law. The training drew participants working in Foreign Affairs, Fisheries and



Environment ministries from across the Caribbean region, as well as those from academia, regional management bodies, the private sector and NGO community.

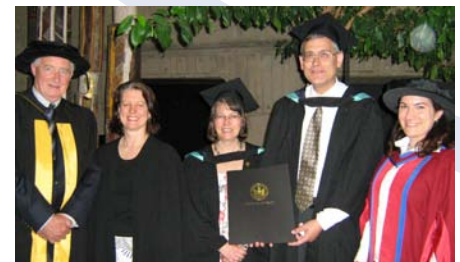
http://www.cavehill.uwi.edu/clic/ioi_training_module.asp

Members of the Latin American-Caribbean alumni of the United Nations - Nippon Foundation Fellowship program, coordinated by Dr. Francois Bailet, UN Division of Ocean Affairs and the Law of the Sea (DOALOS), attended the workshop. MMM alumnae from this group include Tricia Lovell, Antigua (MMM 2002) and Laverne Walker, St. Lucia (MMM 2002).

MAP News

Graduation

Congratulations to Donald Hatcher and Patricia Hinch who graduated at the Spring convocation ceremony on June 1. Erin Fradette, MAP librarian, graduated with her Master of Library and Information Studies degree.



Graduation 2010 (l to r); Peter Wells, MAP Adjunct Professor and academic supervisor for Patricia Hinch, Becky Field, MAP Administrator, Patricia Hinch, MMM 2010, Donald Hatcher, MMM 2010 and Elizabeth de Santo, MAP Assistant Professor).

Alexi Baccardax received her Master of Environmental Studies degree. Alexi's thesis is titled "Incorporating Concerns of Coastal Stakeholders in Planning and Management: The Case of St. Margaret's Bay. Lucia Fanning was her thesis supervisor.



Alumni Update

Congratulations to Daniela Diz on the successful completion of her PhD program at the University of Edinburgh on the implementation of ecosystem-based fisheries management in marine areas beyond national jurisdictions. Daniela is working in Halifax as a consultant to the WWF on strategies for establishing high seas marine protected areas.

Mohammad A.L. Siddique (MMM 2006) has started a PhD Program at the Korea Ocean Research and Development Institute at the University of Science and Technology in South Korea. Latif will study meiofaunal assemblages and ocean health.

Aurelie Cosandey Godin (MMM 2009) spent April and May with the Global Shark Conservation Program at the Pew Environmental Group in Washington DC. She worked on



Aurelie Cosandy Godin at the Kobe II ByCatch Workshop with Matt Rand, Director of the Global Shark Conservation Campaign (left) and Fabian Cousteau, grandson of Jacques Cousteau (right)

developing the Pew Environment Group paper on shark bycatch for the Kobe II Bycatch Workshop held in Brisbane Australia (June 23-25, 2010) <http://www.tuna.org.org/RFMOSAus1.htm>. The goal of the workshop was to review available information, provide RFMOs with best practices, develop a research program and prepare recommendations to RFMOs to avoid duplication of work. Aurelie has been accepted into the PhD program of the Biology Department at Dalhousie and will be supervised by Dr. Boris Worm, world renowned marine ecologist.

Suzette Soomai (MMM 2009) is working with Dr. Bertrum MacDonald and other members of the School of Information Management on the research initiative "Environmental Information: Use and Influence" (www.eiui.ca). As posted on the website, "Our research entails detailed case studies of organizations focused on marine environmental concerns. How these organizations publish, disseminate, and promote awareness, access, and use of their grey literature publications is generally understudied. To manage the environment more effectively, policy makers need to find and make efficient use of this growing body of literature. We are developing an understanding of the extent of this literature, and its information cycle, and developing recommendations so that pertinent information influences decision making processes."

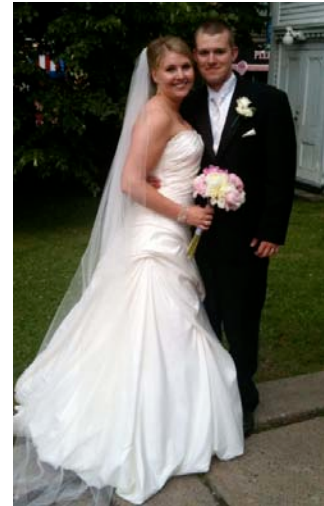
Weddings

Congratulations and Best Wishes to:



Aimee Gromack and Chris Burbidge (MMM 2008) who were married on May 26, 2010 in Akulmal, Mexico. Classmates Drummond Fraser and Owen McHugh joined Aimee's and

Chris's family and friends for the celebration.



Chelsea Garth (MMM 2009) and Jon Douglas who were married on June 26, 2010 in Halifax. Classmates Romero Da Rocha, Jessie McFee, Jacquelyn Rutherford and Suzette Soomai attended the wedding to help celebrate the happy occasion.

Congratulations also go out to Janelle Kennedy (MMM 2006) and François Ouellette who were married on July 10 in Parrsboro, NS.

Welcome to Andrei Polejack

Andrei Polejack, Technical Advisor at the Brazilian Ministry of Science and Technology, joined the MAP family in April. Andrei received the United Nations – Nippon Foundation of Japan Fellowship through the UN DOALOS. During his 6 month placement at MAP, Andrei will undertake research on "A model of Science-Policy interface for Brazilian Marine Sciences" under the guidance of Lucia Fanning. His goal is to review how decisions are made in marine science in Brazil and how policies are formed. He will propose a specific model for science-policy interface with the aim to bridge the gaps associated with the current practice.

Andrei has a BSc in Biology and MSc in Ecology from the Universidade de Brasília and is a founding member of the



NGO Pequi-Pesquisa e Conservação do Cerrado (<http://www.pequi.org.br/>). He is also an ardent soccer fan and has been enjoying watching the World Cup Soccer Tournament while in Halifax.

World Oceans Day

MAP took part in World Oceans Day activities in Halifax and at the UN in New York City.

In Halifax World Oceans Day was celebrated on the Halifax Waterfront on June 4. Displays from various government departments (provincial, federal and municipal), NGOs and universities were set up in the Small Crafts Gallery of the Maritime Museum of the Atlantic as well as outside of the museum.



Members of the MAP Community at the Maritime Museum of the Atlantic (l to r): Andrei Polejack, Rodrigo Menfra (MMM alumni), Erin Mutrie (current student) and Don Hatcher (recent graduate)

Lucia Fanning was invited to participate in a Roundtable Panel Discussion at the UN General Assembly on June 8th. The general topic for discussion was "UNCLOS 15 years after its entry into force". Lucia's presentation "Is regional cooperation a way to enhance ocean governance?" highlighted both the challenges and opportunities countries can and do encounter when attempting to adopt a collaborative approach to regional level ocean governance.

Upcoming Events

Making Waves: MMM Graduate Project Presentations will take place on Tuesday August 24, 2010. Further details will be distributed in early August.

Coastal Zone Canada Conference, Prince Edward Island July 25-29, 2010 <http://www.gov.pe.ca/czc2010/>

Conferences and Panel Presentations

5th Global Forum on Oceans, Coasts and Islands (Paris, May 3-7, 2010) <http://www.globoceans.org/>

- Session 26: Sustainable Governance of the Caribbean Sea: Exploring Horizontal and Vertical Linkages for Effective Governance - *Lucia Fanning* and *Robin Mahon* (MAP Adjunct Professor), organizers and moderators, *Lucia Fanning*, *Robin Mahon*, *Patrick McConney* (MAP Adjunct Professor), panelists.

- Session 14: The Importance of Establishing Networks of Marine Protected Areas and Doing it Right - *Elizabeth De Santo* (MAP Assistant Professor) – panelist. "Governing Marine Protected Areas: Getting the Balance Right"

- Session 42: Strengthening Implementation of Integrated Watershed and Coastal Management – *Laverne Walker* (MMM 2002), panelist

- Session 49: SIDS and Mauritius Implementation: Are Small Island Development States More Capable to Address Vulnerabilities? Assessing Implementation of the Mauritius Strategy for Further Implementation of the Programme of Action for the Sustainable Development of SIDS Five years Later – *Laverne Walker*, panelist

- Session 65: Towards Results-based Integrated and Ecosystem-based Ocean and Coastal Governance: Planning for Evaluation and Indicators – *Laverne Walker*, speaker

- Poster – *Johan Lafeuille*, LLM candidate and PROGOVNET scholar – "Directions for Effective Management of Tuna and Tuna-like Species in the Atlantic to Ensure the Sustainable Development of Small Island Developing Caribbean States". Johan was also a speaker in Session 54: Approaches and Tools for Integrated Management of the High Seas and Seabed beyond National Jurisdiction and Session 49 (noted above).



Participants at the Global Ocean Forum (l to r): Elizabeth Moore, NOAA Office of National Marine Sanctuaries, Chief of Staff for International Activities, Kristina Gjerde, High Seas Policy Advisor, IUCN Global Marine Programme, Johan Lafeuille-Doughlin, LLM student and PROGOVNET Scholar and Elizabeth De Santo, MAP Assistant Professor

China Council for International Cooperation on the Environment and Development Task Force on Ecosystem Issues and Policy Options Addressing the Sustainable Development of China's Seas, Halifax, NS (May 11-12, 2010) - *Elizabeth De Santo* "Marine Spatial Planning: The context" and *Don McCrimmon*, MAP Research Assistant – "Marine Spatial Planning: International Lessons for Canadian Development"

Colloquium on the Outer Limits of the Continental Shelf, Kuala Lumpur, Malaysia (May 11-12, 2010) – *Galo Carrera* (MAP Adjunct Research Associate) panel member at Session VII - *The Letter and Spirit of Article 76 (1) of the United Nations Convention on the Law of the Sea 1982 and Corresponding Provisions of the Rules of Procedure of the Commission on the Limits of the Continental Shelf (CLCS): Are they Compatible?*

United Nations Informal Consultative Process on Oceans and the Law of the Sea, Eleventh Meeting, United Nations, New York (June 21-25, 2010), *Overview of Capacity-building Activities and Initiatives in Ocean Affairs and the Law of the Sea, including Marine Science and Transfer of Technology* – *Cristelle Pratt* (MMM 1994) speaker, "Challenges in capacity-building in relation to research and the development and management of non-living resources". MMM alumni attending this meeting also included *Lucia Fanning* (member of the IOI delegation) and *Anthony Franklin* (MMM 1994 & member of the Trinidad & Tobago delegation).

Expert Consultation on Operationalisation of the Caribbean Sea Commission – Building a science-policy interface for ocean governance in the Wider Caribbean, University of the West Indies, Cave Hill, Barbados (July 7-9, 2010) see

http://www.acs-aec.org/Events/CSea_Experts_Seminar.htm for copies of the presentations.

Lucia Fanning, speaker “The Larger Marine Ecosystem Governance Framework as a model for the Wider Caribbean Region”

MAP Winter Term Seminars

February 15 – John Kearney, MAP Adjunct Professor - *The Role of Learning Communities in Developing Adaptive Strategies for Food Security, Resource Protection, and Community Sustainability*

March 1 – Larry Hildebrand, MAP Adjunct Professor - *Power Sharing in the Coastal Zone: Shifting Roles of Government in Community-based Coastal Management*

March 15 – Daniela Diz, MMM Alumna - *Towards the Implementation of the Ecosystem-Based Fisheries Management in Marine Areas beyond National Jurisdiction*

March 22 - David Mugridge, MAP Adjunct Research Associate - *So if Maritime Security is broken how do we fix it?*

March 24 - Elizabeth Moore, US National Marine Sanctuary Program, and Jon Day from the Great Barrier Reef Marine Park presented a special on-line seminar on best practices as part of the MARA 5013 Marine Protected Area class

March 26 – Camilla Brattland, PhD Candidate, University of Tromsø, Norway - *Coastal Sami Communities on the National Agenda: Indigenous Fishing Rights Processes in Norway*

April 6 – Co-sponsored seminar with the Centre for Foreign Policy Studies - James Manicom Visiting Scholar, School of Political and International Studies, Flinders University, Australia - *The Maritime Territorial Dispute in the Arctic Ocean:*

Questions and Lessons from East Asia

MAP Research

MAP is currently conducting research in the following areas:

- Nova Scotia coastal zone management, supported by the Department of Fisheries and Aquaculture, Province of Nova Scotia – Chris Burbidge and Lucia Fanning

- Regulatory review of nutrient regime alteration and sediment regime alteration for the Department of Fisheries and Oceans – Don McCrimmon and Lucia Fanning

- Regional ocean governance – Lucia Fanning (funded by SSHRC Operating Grant)

Strengthening Principled Ocean Governance Networks – Transferring Lessons from the Caribbean to the Wider Ocean Governance Community (funded by the Nippon Foundation and in partnership with IOI-Canada, Schulich School of Law, CERMES and CLIC, UWI)

- Examining parameters for best practice in the area of Marine Protected Area governance – led by Elizabeth De Santo (funded by UNEP)

Recent Publications

Godin, A. C., and Worm, B., 2010. Keeping the lead: How to strengthen shark conservation and management policies in Canada. *Marine Policy* 34(5): 995-1001.

Fanning, L., Mahon, R. and McConney, P. (Eds). 2010. *Towards Marine Ecosystem-based Management in the Wider Caribbean*. Amsterdam University Press. 368 pp.

Mahon, R., Fanning, L., McConney, P., and Pollnac, R., 2010. Governance characteristics of large marine ecosystems. *Marine Policy* 34 (5): 919-927.

McCall, R. and Choy, T., 2009. Integrated Coastal Zone Management (ICZM) in Guyana: Development barriers, opportunities and recommendations. *In Integrated Coastal Zone Management*. Edited by E. Moksness, E. Dahl and J.

Stottrup. Wiley-Blackwell, Chichester, UK, pp. 219-236.

McCrimmon, D., and Fanning, L., 2010. Using Memoranda of Understanding to facilitate marine management in Canada. *Marine Policy* (current online citation doi:10.1016/j.marpol.2010.06.006).

Siddique, M.A. L. and Volpe, J. P. 2009. Eco-friendly sustainable shrimp aquaculture in Bangladesh: Minimizing coastal degradation. *In Integrated Coastal Zone Management*. Edited by E. Moksness, E. Dahl and J. Stottrup. Wiley-Blackwell, Chichester, UK, pp. 116-130.



25th Anniversary of MAP

MAP will celebrate 25 years of marine management education, research and service to the global coastal and oceans community in 2011. Your input to the planning would be appreciated by completing the following survey.

<https://surveys.dal.ca/opinio/s?s=9005>

Connect to the link for your opportunity to provide us with ideas for events, speakers, social gatherings, field trips, etc.

MAP Matters is the newsletter of the Marine Affairs Program, Faculty of Management, Dalhousie University. Feel free to distribute to your colleagues worldwide.

We welcome your input and contributions. Send news items along with photos of your current activities to marine.affairs@dal.ca.