ARCTIC CLIMATE IMPACT ASSESSMENT

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AMAP Secretariat
P.O. Box 8100 Dep.
N-0032 Oslo, Norway
Tel: +47 23 24 16 30
Fax: +47 22 67 67 06
http://www.amap.no

CAFF International Secretariat
Hafnarstraeti 97
600 Akureyri, Iceland
Tel: +354 461-3352
Fax: +354 462-3390
http://www.caff.is

IASC Secretariat
Middelthuns gate 29
P.O. Box 5156 Majorstua
N-0302 Oslo, Norway
Tel: +47 2295 9900
Fax: +47 2295 9901
http://www.iasc.no

Authors
Listed in each individual chapter

Project Production and Graphic Design
Paul Grabhorn, Joshua Weybright, Clifford Grabhorn (Cartography)

Editing
Carolyn Symon (lead editor), Lelani Arris, Bill Heal

Photography
Bryan and Cherry Alexander (Cover and Chapter 1)

Assessment Integration Team

Robert Corell, Chair	American Meteorological Society, USA
Pål Prestrud, Vice Chair	Centre for Climate Research in Oslo, Norway
Patricia A. Anderson	University of Alaska Fairbanks, USA
Snorri Baldursson	Liaison for the Arctic Council, Iceland
Elizabeth Bush	Environment Canada, Canada
Terry V. Callaghan	Abisko Scientific Research Station, Sweden Sheffield Centre for Arctic Ecology, UK
Paul Grabhorn	Grabhorn Studio, Inc., USA
Susan Joy Hassol	Independent Scholar and Science Writer, USA
Gordon McBean	University of Western Ontario, Canada
Michael MacCracken	Climate Institute, USA
Lars-Otto Reiersen	Arctic Monitoring and Assessment Programme, Norway
Jan Idar Solbakken	Permanent Participants, Norway
Gunter Weller	University of Alaska Fairbanks, USA

ACIA Secretariat

Gunter Weller, Executive Director
Patricia A. Anderson, Deputy Executive Director
Barb Hameister, Sherry Lynch
International Arctic Research Center
University of Alaska Fairbanks
Fairbanks, AK 99775-7740, USA
Tel: +907 474 5818
Fax +907 474 6722
http://www.acia.uaf.edu

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http://www.acia.uaf.edu

Preface

Earth's climate is changing, with the global temperature now rising at a rate unprecedented in the experience of modern human society. These climate changes, including increases in ultraviolet radiation, are being experienced particularly intensely in the Arctic. Because the Arctic plays a special role in global climate, these changes in the Arctic will also affect the rest of the world. It is thus essential that decision makers have the latest and best information available regarding ongoing changes in the Arctic and their global implications.

The Arctic Council called for this assessment and charged two of its working groups, the Arctic Monitoring and Assessment Programme (AMAP) and the Conservation of Arctic Flora and Fauna (CAFF), along with the International Arctic Science Committee (IASC), with its implementation. An Assessment Steering Committee (see page iv) was charged with the responsibility for scientific oversight and coordination of all work related to the preparation of the assessment reports.

This assessment was prepared over the past five years by an international team of over 300 scientists, other experts, and knowledgeable members of the indigenous communities. The lead authors were selected from open nominations provided by AMAP, CAFF, IASC, the Indigenous Peoples Secretariat, the Assessment Steering Committee, and several national and international scientific organizations. A similar nomination process was used by ACIA to select international experts who independently reviewed this report. The report has been comprehensively researched, is fully referenced, and provides the first comprehensive evaluation of arctic climate change, changes in ultraviolet radiation, and their impacts for the region and for the world. Written certification has been obtained from the ACIA leadership and all lead authors to the effect that the final scientific report fully reflects their expert views.

The scientific results reported herein provided the scientific foundations for the ACIA synthesis report, entitled "Impacts of a Warming Arctic", released in November 2004. This English language report is the only official document containing the comprehensive scientific assessment of the ACIA.

Recognizing the central importance of the Arctic and this information to society as it contemplates responses to the growing global challenge of climate change, the cooperating organizations are pleased to forward this report to the Arctic Council, the international science community, and others around the world.

Financial support for the ACIA Secretariat was provided by the U.S. National Science Foundation and National Oceanic and Atmospheric Administration. Support for ACIA-related workshops, participation of scientists and experts, and the production of this report was provided by the governments of the eight Arctic nations, several other governments, and the Secretariats of AMAP, CAFF, and IASC.

The Arctic Council

The Arctic Council is a high-level intergovernmental forum that provides a mechanism to address the common concerns and challenges faced by arctic people and governments. It is comprised of the eight arctic nations (Canada, Denmark/Greenland/Faroe Islands, Finland, Iceland, Norway, Russia, Sweden, and the United States of America), six Indigenous Peoples organizations (Permanent Participants: Aleut International Association, Arctic Athabaskan Council, Gwich'in Council International, Inuit Circumpolar Conference, Russian Association of Indigenous Peoples of the North, and Saami Council), and official observers (including France, Germany, the Netherlands, Poland, United Kingdom, non-governmental organizations, and scientific and other international bodies).

The International Arctic Science Committee

The International Arctic Science Committee is a non-governmental organization whose aim is to encourage and facilitate cooperation in all aspects of arctic research among scientists and institutions of countries with active arctic research programs. IASC's members are national scientific organizations, generally academies of science, which seek to identify priority research needs, and provide a venue for project development and implementation.

Assessment Steering Committee

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Gordon McBean (from Aug. 2000)	Conservation of Arctic Flora and Fauna, Canada
Lars-Otto Reiersen	Arctic Monitoring and Assessment Programme, Norway
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Terry Fenge	Permanent Participants, Canada
Jan-Idar Solbakken	Permanent Participants, Norway
Cindy Dickson (from July 2002)	Permanent Participants, Canada

ACIA Secretariat

Gunter Weller, Executive Director	ACIA Secretariat, USA
Patricia A. Anderson	ACIA Secretariat, USA

Lead Authors*

Jim Berner	Alaska Native Tribal Health Consortium, USA
Terry V. Callaghan	Abisko Scientific Research Station, Sweden Sheffield Centre for Arctic Ecology, UK
Henry Huntington	Huntington Consulting, USA
Arne Instanes	Instanes Consulting Engineers, Norway
Glenn P. Juday	University of Alaska Fairbanks, USA
Erland Källén	Stockholm University, Sweden
Vladimir M. Kattsov	Voeikov Main Geophysical Observatory, Russia
David R. Klein	University of Alaska Fairbanks, USA
Harald Loeng	Institute of Marine Research, Norway
Gordon McBean	University of Western Ontario, Canada
James J. McCarthy	Harvard University, USA
Mark Nuttall	University of Aberdeen, Scotland, UK University of Alberta, Canada
James D. Reist (to June 2002)	Fisheries and Oceans Canada, Canada
Frederick J. Wrona (from June 2002)	National Water Research Institute, Canada
Petteri Taalas (to March 2003)	Finnish Meteorological Institute, Finland
Aapo Tanskanen (from March 2003)	Finnish Meteorological Institute, Finland
Hjálmar Vilhjálmsson	Marine Research Institute, Iceland
John E. Walsh	University of Alaska Fairbanks, USA
Betsy Weatherhead	University of Colorado at Boulder, USA

Liaisons

Snorri Baldursson (Aug. 2000 - Sept. 2002)	Conservation of Arctic Flora and Fauna, Iceland
Magdalena Muir (Sept. 2002 – May 2004)	Conservation of Arctic Flora and Fauna, Iceland
Maria Victoria Gunnarsdottir (from May 2004)	Conservation of Arctic Flora and Fauna, Iceland
Snorri Baldursson (from Sept. 2002)	Arctic Council, Iceland
Odd Rogne	International Arctic Science Committee, Norway
Bert Bolin (to July 2000)	Intergovernmental Panel on Climate Change, Sweden
James J. McCarthy (June 2001 – April 2003)	Intergovernmental Panel on Climate Change, USA
John Stone (from April 2003)	Intergovernmental Panel on Climate Change, Canada
John Calder	National Oceanic and Atmospheric Administration, USA
Karl Erb	National Science Foundation, USA
Hanne Petersen (from Sept. 2001)	Denmark

*Not all lead authors are members of the Assessment Steering Committee. For a full list of authors see Appendix A.

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