



INTERNATIONAL GLACIOLOGICAL SOCIETY

International Symposium on
Interactions of Ice Sheets and
Glaciers with the Ocean



Scripps Seaside Forum
Scripps Institution of Oceanography
La Jolla, California, USA
5–10 June 2011

Co-sponsored by:

- ❄ National Science Foundation (NSF)
- ❄ National Aeronautics and Space Administration (NASA)
- ❄ Scientific Committee on Antarctic Research (SCAR)
- ❄ WRCP Climate and Cryosphere Project (CliC)
- ❄ Scripps Institution of Oceanography
- ❄ Forum for Research into Ice Shelf Processes (FRISP)

SECOND CIRCULAR

November 2010

<http://www.igsoc.org/symposia/>

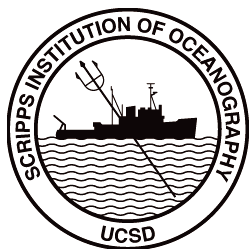


The International Glaciological Society will hold an International Symposium on 'Interactions of Ice Sheets and Glaciers with the Ocean' in 2011. The symposium will be held on the oceanfront in La Jolla, California, USA, from 5–10 June 2011. The Symposium is joined with the annual Forum for Research into Ice Shelf Processes (FRISP) meeting. FRISP (<http://folk.uib.no/ngfso/FRISP/index.html>) is a subcommittee of the Scientific Committee on Antarctic Research (SCAR) Working Group of Glaciology.

THEME

The mass balance of the Antarctic and Greenland ice sheets and the circulation of the adjacent oceans are strongly coupled through physical processes occurring at the ice-ocean interfaces at the fronts and bases of ice shelves and glacier tongues, and the termini of tidewater glaciers. Improved understanding of these processes is essential so that they can be realistically represented in models of how ice sheets and glaciers would evolve in a changing climate, and to improve predictions of global ocean circulation and sea level change. The goals of this symposium are to: (1) assess the state of our knowledge of ice-ocean interactions; and (2) discuss what is needed for development of reliable, quantitative models of ice sheet evolution.

We hope this symposium will attract experts in ice shelf, ice sheet, glacier, ocean and climate studies whose research addresses interactions of the ocean and ice in the global climate system using in situ observations, remote sensing and/or modelling. We encourage contributions on all aspects of ocean interactions with ice sheets and glaciers, towards achieving the symposium goals. Come and attend what will be a stimulating and productive symposium in a beautiful setting in Southern California.





SUGGESTED TOPICS

The thematic focus of the Symposium is on ice–ocean interaction in the broadest sense, and all interpretations of this theme will be welcome as submissions for presentation at the meeting. Suggestions for specific topics of interest are:

1. Mass balance of ice shelves and tidewater glaciers, including the physics of melting and freezing at the ice–ocean interface and iceberg calving, forcing from ocean and atmosphere, and sensitivity to climate change.
2. Dynamics of ice shelves and tidewater glaciers, including: the response to changes in surface and basal mass balance; response to tidal forcing; impact of calving events; and processes influencing ice rheology and susceptibility to fracture.
3. Coupling between grounded and floating ice, including controls on the location of grounding lines, response of inland ice to thinning and break-up of ice shelves and termini of tidewater glaciers, transmission of tidal forcing across the grounding line.
4. Oceanic response to the input of ice, including the impact of meltwater and drifting icebergs on regional and global ocean circulation and sea level.
5. Role of atmosphere/sea ice/ocean processes in delivering ocean heat to glaciated coastlines, including the impact of past, present and future climate variability.
6. Records of change in ice shelves and tidewater glaciers, including time series derived from direct observation and studies of the past impacts of ice sheet–ocean interaction preserved in the ice core and marine geological record.
7. Observational and modelling techniques that advance our understanding of ice sheet–ocean interaction, including strategies for understanding and monitoring ocean forcing and ice sheet/glacier response, techniques for coupling ice sheet/shelf models with ocean circulation/climate models.





ABSTRACT AND PAPER PUBLICATION

Participants wishing to present a paper (either oral or poster) at the Symposium will be required to submit an abstract by 4 March 2011. A collection of submitted abstracts will be provided for all participants at the Symposium. The Council of the International Glaciological Society has decided to publish a thematic issue of the *Annals of Glaciology* on 'Ice–ocean interaction' which is consistent with the Symposium themes. Submissions to this issue will not be contingent on presentation at the Symposium, and material presented at the symposium is not necessarily affirmed as being suitable for consideration for this issue of the *Annals*. Participants are encouraged, however, to submit manuscripts for this *Annals* volume. The deadline for receiving *Annals* papers is 22 April 2011.

VENUE: The symposium will be held at the new Scripps Seaside Forum, an extraordinary, oceanfront conference center facility located in the heart of Scripps Institution of Oceanography, with a breathtaking view over the Pacific Ocean. Just steps from the sand, it offers a relaxed and comfortable atmosphere, yet provides conference support through state-of-the-art audio-visual equipment ranging from 3D projection systems, multiple computer connections, and surround-sound. The beachfront location offers plenty of opportunity for relaxation during conference breaks.

REGISTRATION FEES

All fees are in US Dollars, USD

– Participant (IGS member):	\$520
– Participant (not IGS member):	\$600
– Student or retired IGS member:	\$260
– Accompanying person (21+):	\$100
– Accompanying person (12–20):	\$60
– Accompanying person (<12):	Free
– Late registration surcharge (after 25 March 2011):	\$80

REGISTRATION BY MAIL: Though we strongly prefer registration through the website, it can also be done by filling in and returning the back page of this circular. If payment by credit card is not possible, contact the IGS office to arrange for a bank transfer. Payments made after 25 March 2011 must include the





additional \$80 late-registration fee. When completed, please send the form to the Secretary General at the IGS address.

ACCOMPANYING PERSONS: The accompanying person's registration fee (\$100 for 21 and over; \$60 for ages 12–20; under 12 free) includes the icebreaker, the Tuesday evening reception, and the symposium banquet. Short excursions and activities in and around San Diego will be offered on request at additional cost.

STUDENT/POSTDOC support: NSF and NASA have provided funds to partially support student and postdoc attendance at this symposium. If you would like to apply for these funds, please send a justification letter and your proposed abstract title and a summary to hafricker@ucsd.edu by 4 February 2011. If you are not a student or postdoc, but have limited access to travel funds, your application will also be considered.

LOCATION: San Diego is renowned for its idyllic climate, enjoying beautiful weather year round with an average daily temperature of 70.5°F (21.4°C). California's second largest city and the USA's eighth largest, San Diego has a citywide population of nearly 1.3 million. As well as its beaches, San Diego has an impressive array of world-class family attractions, such as the San Diego Zoo and Wild Animal Park, Sea World San Diego and LEGOLAND California. San Diego offers an expansive variety of things to see and do, appealing to guests of all ages. This would be the ideal destination for an accompanying family! The most difficult decision to make regarding a trip to San Diego is determining what to do and see among the region's vast and diverse offerings.

GETTING TO SAN DIEGO: San Diego International Airport (SAN) is conveniently located right in the city center, which is about 14 miles from La Jolla. Transfer from the airport is an easy 25-minute journey by taxi, Cloud 9 Shuttle, or rental car. The airport is served by most of the major airlines and has direct flights to most US cities including: Denver, Dulles, BWI, New York, Chicago. For European attendees, British Airways are conveniently starting a non-stop daily flight from London Heathrow to San Diego in June 2011. Travelling on other airlines from Europe or Australia you will need to connect in a US hub, most likely on the East coast of the US or at LAX or SFO. Flying to LAX and then surface transport to La Jolla is another feasible option.





ACCOMMODATION: Blocks of rooms (at \$139 + tax for a single) have been held at two hotels near Scripps Institution of Oceanography: the Hotel La Jolla and the La Jolla Shores Hotel. Both these hotels have shuttles and are also located an easy 20-minute walk along the beach from the conference venue. For those who prefer to stay elsewhere, the venue is on Bus Route 30, which passes through Downtown La Jolla and Pacific Beach, so you can seek accommodation in these places. There are also vacation rentals in La Jolla for larger groups or families.

PARKING: Parking can be quite tricky at Scripps Institution of Oceanography if you do not have a permit. If you do need to bring a car in on any of the days, please let us know so we can have some day permits available for purchase (at \$8 each).

MID-WEEK ACTIVITIES: After the first couple of days looking wistfully at the beach during breaks, you will finally get the chance to spend some time there mid-week. In keeping with IGS tradition, Wednesday afternoon will be reserved for recreation, and we will offer a selection of waterfront activities for your enjoyment and relaxation: surfing, sea-kayaking, stand-up paddle-boarding, beach volleyball and walking. Just tell us when you arrive on site which of these activities you prefer. There will be a fee for these activities.

RECEPTIONS: There will be an icebreaker reception at 'Surfside' next to the Scripps Forum on Sunday 5 June from 4–7pm. Come along to meet your fellow delegates, get orientated at the conference site and pick up your registration package. Scripps Emeritus Professor Walter Munk has generously offered his La Jolla home 'Seiche' to the conference for a reception on the Tuesday evening – this is an occasion not to be missed!

BANQUET: The banquet will be held on Thursday evening at a waterfront restaurant on the beautiful San Diego bay. This promises to be a memorable evening with your colleagues and friends. Transport to the restaurant from the conference venue will be provided.

The receptions, banquet and all luncheons are included in the registration fee.

Information will be updated on the conference website, <http://www.igsoc.org/symposia/2011/California/> as it becomes available.





SYMPOSIUM ORGANIZATION

Magnús Már Magnússon (International Glaciological Society)

LOCAL ORGANIZING COMMITTEE

Helen Amanda Fricker (Chair), Sarah Gille, Laurie Padman, Eric Rignot, Ted Scambos and Slawek Tulaczyk

SCIENTIFIC STEERING AND EDITORIAL COMMITTEE

Chief Editor: Slawek Tulaczyk (University of California, Santa Cruz)

Associate Editors include: Poul Christoffersen, Helen Amanda Fricker, David Holland, Stan Jacobs, Adrian Jenkins, Laurie Padman, Eric Rignot, Michiel van den Broeke, Douglas MacAyeal, Ted Scambos and Fiammetta Straneo

CONTACTS FOR FURTHER INFORMATION

Further information may be obtained from:

Magnús Már Magnússon

International Glaciological Society

Scott Polar Research Institute

Lensfield Road, Cambridge, CB2 1ER, UK

Tel: +44 (0)1223 355 974/Fax: +44 (0)1223 354 931/Email: igsoc@igsoc.org

Web: <http://www.igsoc.org/symposia/2011/California/>

Helen Amanda Fricker

Scripps Institution of Oceanography

University of California San Diego

Inst. of Geophysics & Planetary Physics

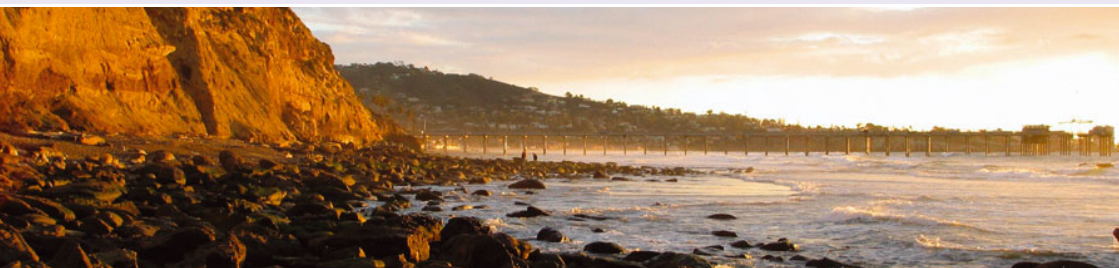
9500 Gilman Drive, La Jolla, CA 92093-0225, USA

Tel: +1 858-534-6245/Email: hafricker@ucsd.edu

Local symposium website: <http://glaciology.ucsd.edu/igs2011> (from 3 January 2011)

IMPORTANT DATES

Abstract submission deadline:	4 March 2011
Notification of acceptance:	18 March 2011
Pre-registration deadline:	25 March 2011
Paper submission deadline:	22 April 2011
Deadline for refund:	29 April 2011
Registration and Icebreaker:	5 June 2011
Conference begins:	6 June 2011
Final revised papers deadline:	12 August 2011





INTERNATIONAL SYMPOSIUM ON INTERACTION OF ICE SHEETS AND
GLACIERS WITH THE OCEAN
San Diego, California, USA, 5–10 June 2011
REGISTRATION FORM

Register online at www.igsoc.org/symposia/2011/California/registration

Family Name: _____

Given Name: _____

Address: _____

Tel: _____ E-mail: _____

Accompanied by:

Name: _____ Age (if under 21) _____

Name: _____ Age (if under 21) _____

Dietary and other requirements: _____

Registration fees (US dollars)

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TOTAL REGISTRATION FEES £ _____

Payment of registration fee by MasterCard, VISA or American Express

Card number

Expiration / CVV (last 3 numbers on signature strip)

Name of card holder as shown on card: _____

Signature: _____