# Workshop

# The future of geodetic-geophysical observational networks in Antarctica

# **Invitation and workshop details**

As chairs of SC2.2 "Probing the Solid Earth and Its Interactions" we cordially invite all interested scientists – and especially early-career scientists and students – as well as stakeholders to this workshop with the goal to discuss the science rationale of geodetic-geophysical in-situ measurements in Antarctica. We will evaluate the challenges and benefits of utilizing respective infrastructure in dedicated, temporarily restricted projects as well as with a long-term prospect. For this, the international cooperation and coordination will get even more important especially when defining the most important scientific questions and developing new ideas to exploit synergies in a much better way than at present.

Mirko Scheinert and Weisen Shen

#### **Location and Dates**

**Location: Fort Collins, Colorado, USA.** 

The workshop will be held at the Lory Student Center of Colorado State University, Fort Collins (CO), USA.

Dates: 29 September - 1 October 2022.

The workshop will start on September 29, afternoon, with pre-workshop side meeting and ice-breaker reception, and will end on October 1, late noon.

### **Dates & Deadlines**

Coming soon Registration opens

5 September 2022 Last day to register and to apply for travel support (ECS)

30 August 2022 Last day to book pre-reserved accommodation at Hotel Hilton

Fort Collins

19 September 2022 Final agenda

29 September 2022, ~6 pm Icebreaker reception 30 September 2022, 8:30 am Workshop opening 01 October 2022, ~2 pm Workshop closing

## Registration

Registration includes breakfast and lunch on 30 September and 1 October, coffee breaks, fees for venue and workshop administration.

It is anticipated – depending on the finally acquired funding – to reimburse the registration fee, at least for early-career scientists.

US\$ 80 Regular registration fee

US\$ 50 Reduced registration fee, holds for early-career scientists (undergraduate,

graduate and PhD students, postdocs up to five years after PhD)

Details on the registration (web link and payment) will be given soon.





#### Venue

**Lory Student Center, Colorado State University**, 1101 Center Avenue Mall,
Fort Collins, CO 80521.

The Lory Student Center is adjacent to the Natural Resources Building, which hosts the Department of Geosciences (400 University Ave., Fort Collins, CO 80523).

See overview map on page 4.

Useful links:

https://lsc.colostate.edu/ https://warnercnr.colostate.edu/geosciences/visit-us/



#### **Accommodation**

A contingent has been pre-booked at the hotel **Hilton Fort Collins** at 425, W Prospect Rd, Fort Collins, CO 80526. The hotel is located in easy walking distance to the venue, Lory Center at CSU. Rate per night: US\$ 170 (single or double room), excluding breakfast and taxes.

Deadline for reservation: 30 August 2022. Details on how to make the reservation will be given soon (together with the registration web link).

Please pay attention to state your individual time period for the stay.

#### **Travel**

For all attendees coming from outside the Denver area, Denver International Airport (DEN) will be the major hub. Convenient shuttle service from the airport to Fort Collins is provided by Groome. It is also possible to use Uber or Lyft, although these will be much more expensive than Groome. Useful link: <a href="https://groometransportation.com/fort-collins-loveland/">https://groometransportation.com/fort-collins-loveland/</a>

## **Application for travel support (especially for ECS)**

We are grateful to the Scientific Committee of Antarctic Research (SCAR) and to the US National Science Foundation (NSF) to grant financial support for the workshop. Thus, we will be able to partially take over travel costs to support the attendance of early-career scientists. The size of the support depends on the funding we will be finally granted and the number of applications. To apply for travel support, please mark accordingly in the registration form.

## **Preliminary agenda**

29 September 2022 ~6 pm Icebreaker reception 30 September 2022 8.30 am – 6 pm Workshop day 1 01 October 2022 8.30 am – 2 pm Workshop day 2

The program will consist of specific science sessions and one session on infrastructure, logistics and coordination. We are already in the process of inviting experts in specific fields to cover all themes to be discussed.









### The sessions to be included are:

Session I: Observational networks and (re-)processing efforts

Session II: GNSS continuous/scattered time series and their applications
Session III: Seismology – benefits of short-term vs. long-term recordings
Session IV: Synthesis of the data collected over the past two decades

Session V: Broad implications: GIA and beyond
Session VI: Infrastructure, logistics and coordination

Talks at these sessions will be given 15 min including short Q&A. Each session will be concluded by a panel discussion to debate the various aspects in more detail but also to keep track of the entire theme.

These sessions will be complemented by a poster session (including a rapid poster introduction) on day 1, and break-out group discussions.

An important goal will be to finally agree on a roadmap for drafting a white paper which should be a major result of the workshop to substantiate the science directions and mid- to long-term strategies for realizing geodetic-geophysical observations in Antarctica.

The detailed agenda will be provided in on 19 September 2022 at the latest.

#### **Call for scientific contributions**

We invite further contributions on specific research projects and investigations. We especially encourage ECS to take part in the workshop and to present their research. Contributions will be presented as posters. A dedicated poster session (including a rapid introduction) is being planned. Please announce your contribution in the registration form.

#### **Contact**

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Rick Aster Local Host

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We are grateful to Rick Aster for being our local host. Rick Aster is professor of geophysics and head of Department of Geosciences at the Warner College of Natural Resources, Colorado State University.



Geology Geophysics Hydrogeology Environmental Geology

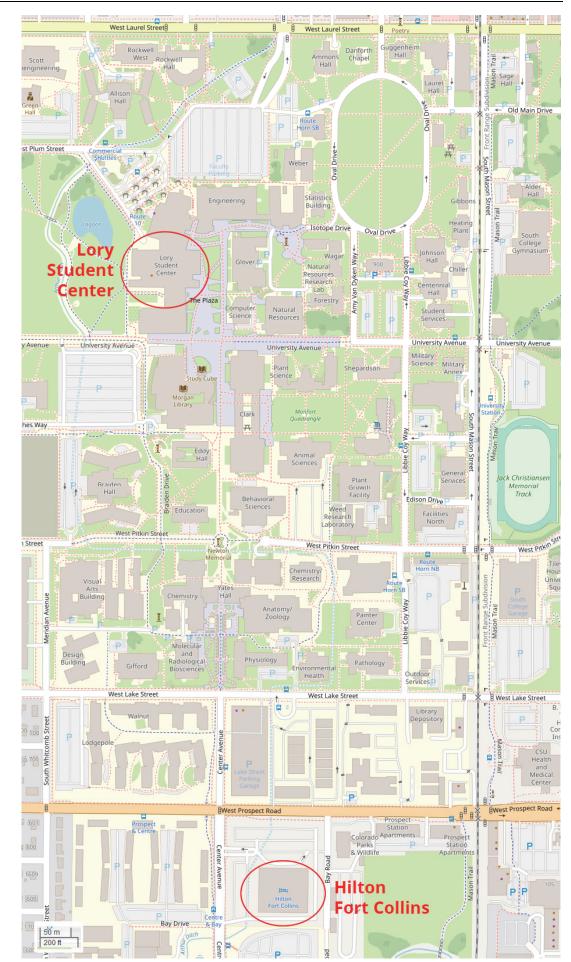








## **Overview map**



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