



Stockholm Symposium on the Social Cost of Carbon

Stockholms Universitet, De Geer-salen, Geovetenskapens hus
25-27 May, 2015

Convener: Raymond T. Pierrehumbert,
Kung Carl XVI Gustaf Visiting Chair in Environmental Sciences

This event is open to the public, but those who wish to attend should register in advance by sending email to susanna.berglund@misu.su.se with the words “Stockholm SCC” in the subject heading, preferably by 15 May.

Student/Postdoc presentations (15 minutes) are now solicited. Send title and abstract to emma.Karlsson@aces.su.se

It is almost universally agreed that the climate change resulting from human-caused emissions of carbon dioxide and other greenhouse gases poses a serious (and perhaps even existential) threat to current and future generations. It is also broadly recognized that addressing the problem requires putting a price on the emission of carbon dioxide, and perhaps also on emission of other greenhouse gases. The price might be implemented as a tax on emissions, or in the form of tradable emission permits, or (indirectly) in the form of direct regulation of emissions (the cost of which often needs to be justified in terms of the cost of damages avoided). A central challenge of figuring the Social Cost of Carbon is that the price put on emissions is almost invariably a monetary cost, whereas the “cost” of damages caused by emissions often cannot be measured adequately in terms of the monetary value of market activities.

The process of figuring a Social Cost of Carbon requires a sound understanding of the nature of the environmental changes brought about by greenhouse gas emissions, and of their impacts. It also requires development of methodologies for translating knowledge of such impact into a price to be charged for emissions. This symposium brings together a number of world leaders doing research on key areas of this problem, approaching it from the standpoint of the social, biological and physical sciences.

Scientific Program

All sessions are in de Geer (Geovetenskapens hus) unless otherwise noted

Monday, 25 May:

9: AM: Emissions to temperature: Carbon/Climate system basics

9:-10 Ray Pierrehumbert

Welcome and introduction to main themes of the meeting

10-11 Rodrigo Caballero

Climate Sensitivity, linear and nonlinear

11-11:30 Fika!

11:30-12:30 Patrick Crill

Land carbon uptake and release

12:30-1:30: Lunch break

1:30PM (de Geer): Economic methodology and integrated assessment modeling

1:30-2:30 Chris Hope

The PAGE09 IAM

2:30-3:00 Amir Jina

Empirical approaches to SCC

3:00- 4:00 David Weisbach

Methodologies for discounting future climate damages

4:00-4:30 Fika!

4:30-5:30 Tim Lenton

Stochastic IAM's

5:30-6:30 Robert Kopp

Empirical damage functions in the estimation of climate risk:
Lessons from the American Climate Prospectus.

6:30-7:00 PM General Reception (Wine, hors d'oeuvres, etc.), Geohuset

Tuesday, 26 May:

9AM (de Geer): Impacts, damages, Carbon/Climate sensitivity

9-10 Matt Huber

Steambath World

10-10:30 Fika!

10:30-11:30 Student/Postdoc presentations

11:30-12:30 Myles Allen

Implications of recent revisions of climate sensitivity measures
for Social Cost of Carbon

12:30-1:30: Lunch break

1:30PM (de Geer): Damages and Integrated Assessment Modeling
1:30-2:30 David Battisti
Global Food Production and Climate Change
2:30-3:00 Michael Glotter
Modeling agricultural production
3:00-4:00 Elizabeth Moyer
Failures of IAM's, and the path forward
4:00-4:30 Fika!
4:30 - 6:00 Per Krusell and John Hasseler
-Economic modeling at high spatial resolution
-A unified view of SCC (From Handbook of Env. Economics)

7:30 PM Conference banquet, for speakers and selected others

Wednesday, 27 May:

9 AM (de Geer): Surf and Turf
9:00-10:00 Kevin Noone
How Much are the oceans worth to you?
10:00-10:30 Student/Postdoc presentations

10:30-11:30 Bolin Center Science Forum, Nordenskiöld room, Geohuset
Ulrike Lohmann, ETH Zurich
Measurement and simulation of orographic mixed-phase clouds

11:45-12:30 (de Geer) Additional Student/Postdoc presentations

12:30-1:45: Lunch break

2-3 PM: Bolin Lecture, Aula Magna
Ulrike Lohmann, ETH Zurich
Uncertainties in climate projections related to clouds and aerosols
(Followed by reception outside Aula Magna)

3:45 (de Geer): Where do we go from here?
3:45-4:30 Karin Bäckstrand
Climate Governance on the Road to Paris;
New Directions in Policy Practice and Scholarship
4:30-5:00 Aaron Maltais (Statsvet SU, tentative)
Climate Justice
5:00-5:30 Wrap-up discussion, moderated by RTP

List of keynote speakers

M. Huber U. of New Hampshire, Earth Sciences
David Battisti, U. of Washington, Atmospheric Science
Elisabeth Moyer U. of Chicago, Geophysical Sciences
David Weisbach U of Chicago, Law
Myles Allen Oxford University, Environmental Change Institute
Robert Kopp Rutgers University, Dept. of Earth and Planetary Sciences
Rutgers Energy Institute
Tim Lenton Exeter University,
Dept. of Geography (Chair in Climate Change and Earth System
Science)
Chris Hope Cambridge University (Cambridge Judge Business School)

Michael Glotter U. of Chicago, geophysical sciences
Amir Jina U. of Chicago, Economics

Locals:

R. Pierrehumbert Chicago/Stockholm/Oxford
Kevin Noone Stockholms Universitet, Environmental Science
Stockholm Resilience Center
Swedish Secretariat for Environmental Earth System Science
Per Krusell Stockholms Universitet, Economics
(Avoid Tuesday morning)
John Hassler Stockholms Universitet, Economics
(Avoid Tuesday morning)
K. Bäckstrand Stockholms Universitet, Political Science karin.backstrand@statsvet.su.se

Patrick Crill Stockholms Universitet, Geo
Rodrigo Caballero Stockholms Universitet, MISU

