

## Arctic Science, 18 January – 26 February 2016 4.5 ECTS

### Preliminary Schedule

The Swedish Government finances this course. It is a distance course with one meeting in Umeå in January and one in Kiruna in February.

#### Course coordinator and examiner

Dr. Carol Norberg, Umeå University

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We reserve the right to make adjustments in the schedule if necessary. The exact schedule will be somewhat dependent on the weather.

### Umeå meeting 25-26 January

#### Introduction to Arctic Science for exchange students

<b>Monday 25 January</b> <b>15:15 – 17:00</b> <b>Room MC413</b> <b>MIT building</b>	<i>General information and course registration</i> <i>Overview of the course</i> <i>Introduction to the physics of the aurora and the aurora observation exercise</i> Carol Norberg
<b>Tuesday 26 January</b> <b>Room MC413</b> <b>MIT building</b> <b>8:15 – 09:00</b>	<i>Presentation of the individual project</i> <i>Ice particles in the atmosphere and optical phenomena in the arctic</i> Carol Norberg
<b>9:15 – 10:00</b>	<i>Current activities of the Swedish Institute of Space Physics</i> Lars Eliasson

## Kiruna meeting, 14<sup>th</sup> – 17<sup>th</sup> February 2 nights in Kiruna, 1 night in Abisko

<p><b>Sunday 14 Feb.</b> 07:08 (recommended)</p> <p>16:30 – 17:30</p>	<p>Train departs from Umeå C, arrives Kiruna 15:09 (1 change in Boden station)</p> <p><b>Folkhögskolan Conference Centre</b> <i>Living in a cold climate</i>, Fredrik Kjellberg</p> <p>Evening: Independent aurora observations weather permitting</p>
<p><b>Monday 15 Feb.</b> Early start!</p> <p>8:30 – 9:30</p> <p>9:30 – 10:00</p> <p>10:00 – 10:45</p> <p>11:00 – 12:00</p> <p>12:15 – 13:00</p> <p>13:00</p> <p>13:30 regular bus to Jukkasjärvi, arrives 13:40</p> <p>15:30 or 16:30</p>	<p><b>Swedish Institute of Space Physics, Auditorium</b> Regular bus departs from bus station 07:55, passes OK Parken approx. 8:00, arrives Space Campus 08:25 <i>Practical matters &amp; presentation</i>, Carol Norberg &amp; Carina Gunillasson</p> <p>Coffee</p> <p>Tour of the Space Campus</p> <p><i>Icehotel movie</i></p> <p>Lunch</p> <p>Group photograph</p> <p><b>Visit to ICEHOTEL, Jukkasjärvi</b> Guided tour of the ICEHOTEL followed by free time to look around. Regular bus departs Jukkasjärvi and returns to Kiruna town centre.</p> <p>Evening: Independent aurora observations weather permitting</p>
<p><b>Tuesday 16 Feb.</b> 9:00 – 11:00</p> <p>13:30</p> <p>15:00</p> <p>15:45</p> <p>16:00 – 17:00</p> <p>17:30</p> <p>21:00</p>	<p><b>Folkhögskolan Aulan</b> <i>Snow exercise</i>, Maria Johansson The exercise comprises an introduction, outdoor snow pack investigation, involving digging in the snow and concludes with a group discussion.</p> <p><b>Abisko excursion</b> Chartered bus departs for Abisko from Folkhögskolan</p> <p><i>Check-in at the tourist station</i></p> <p>Bus transfer to Abisko Research Station</p> <p><i>The climate's impact on the Arctic environment</i>, Keith Larsson at the Abisko Research Station</p> <p>Dinner at restaurant followed by walk back to the tourist station.</p> <p>Gather in the reception dressed for outdoor aurora observations</p>
<p><b>Wednesday 17 Feb</b> 9:30</p> <p>10:00 – 11:00</p> <p>12:09 (recommended)</p>	<p><b>Abisko tourist station</b> <i>Check-out and room cleaning check</i></p> <p><i>Lecture: Avalanches</i> in conference room Konten</p> <p>Train departs from Abisko, arrives Umeå 21:55 (1 change at Boden station)</p>

A bus journey between Kiruna city center and the Swedish Institute of Space Physics costs about 24 Swedish kronor for students.

### Participating lecturers

Dr. Carol Norberg, Reader in Space Physics, Umeå University

Dr. Lars Eliasson, Director, Swedish Institute of Space Physics

Maria Johansson, Kiruna

Dr. Fredrik Kjellberg, Senior physician Kiruna Hospital

Dr. Keith Larsson, Postdoctoral researcher, Climate Impacts Research Centre, Umeå University