

LERU STudent REseArch Mobility Programme (STREAM)  
Project proposal



**Host University:**  
Università degli studi di Milano



**Field:**  
Earth Sciences

**Specified field, subject:**  
Mountain glaciers

**Research project title:**  
Distributing surface melt of mountain glaciers



Possible starting month(s):

| Sep | Oct | Nov | Dec | Jan | Feb | Mar | Apr | May | Jun | Jul | Aug |
|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|-----|
|     | x   |     |     |     |     |     |     |     |     |     |     |



Possible duration in months:

| 1 | 2 | 3 | 4 | 5 | 6 |
|---|---|---|---|---|---|
|   |   |   |   |   | x |



**Suitable for students in:** 2<sup>nd</sup> cycle (Master students)

**Prerequisites:** physical climatology, meteorology, glaciology, remote sensing, GIS

**Restrictions:** none



**Description:**

The project is an already on line activity at the DST UNIMI. The UNIMI glacio staff has been developing a model to describe energy and mass exchanges at the surface of mountain glaciers. The selected undergraduate students will be part of the research team supporting the analyses devoted to describe the energy budget on debris covered and debris free glacier conditions. A first group of students will be part of the team devoted to distribute at the glacier surface the meteo and energy inputs, mainly the turbulent fluxes and snow precipitation and amount. The students who will start the activity in June will enjoy some field work on Alpine glaciers as well. A second group of students will be devoted to remote sensing investigations to test new applications for describing glacier surface conditions (debris coverage occurrence, albedo variability, SWE distribution, etc.), these are fundamental input data for the melt model.



**Faculty or Department** Department of Earth Sciences "Ardito Desio" -  
Università degli Studi di Milano

**Contact person:** International relations office, University of Milan

**Contact email:** international.programmes@unimi.it.