

**Trafoi, 31.08-07.09.2026**

**Training Team:**

RGIK component: Francesco Brardinoni (FB), Yan Hu (YH), Line Rouyet (LR), Flavius Sirbu (FS)

ERT component: Jacopo Boaga (JB), Alberto Carrera (AC), Mirko Pavoni (MP)

UAV component: Sebastián Vivero (SV), Janos Meszaros (JM)

**DAILY SCHEDULE**

**Monday, 31 August: Conference Room @ Naturatrafoi**

|               |                                                                                               |
|---------------|-----------------------------------------------------------------------------------------------|
| 17:00 – 19:00 | Arrival, check-in and welcome                                                                 |
| 19:00 – 20:00 | Dinner                                                                                        |
| 21:00 – 21:40 | Introducing the School (FB, YH, LR)<br>Illustrating the logistics of the field excursion (FB) |

**Tuesday, 1 September**

|               |                                                                              |
|---------------|------------------------------------------------------------------------------|
| 7:15 – 8:00   | Breakfast                                                                    |
| 8:30 – 18:30  | Field excursion led by Dr. Volkmar Mair (Geological Survey of Bozen-Bolzano) |
| 19:00 – 20:00 | Dinner                                                                       |

**Wednesday, 2 September: Conference Room @ Naturatrafoi**

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|---------------|---------------------------------------------------------------------------------------------------------------------------------------------|
| 7:30 – 8:15   | Breakfast                                                                                                                                   |
| 8:30 – 9:35   | Lecture: Background and introduction to RGIK (FB, FS)<br>RoGI Geomorphological Approach: Main definitions and detection                     |
| 9:40 – 10:15  | Lecture: RoGI Geomorphological Approach<br>Outline delineation rules and demo (YH)                                                          |
| 10:15 – 10:45 | Break                                                                                                                                       |
| 10:45 – 12:30 | Laboratory: Primary markers and outline delineation:<br>Individual exercise and discussion (FB, FS, YH, LR)                                 |
| 12:45 – 13:45 | Lunch                                                                                                                                       |
| 14:30 – 16:00 | Lecture: RGIK RoGI kinematic approach:<br>InSAR guidelines and demo of MA detection and characterization on interferograms (LR, YH)         |
| 16:00 – 16:30 | Break                                                                                                                                       |
| 16:30 – 18:30 | Laboratory: Moving Area detection, delineation, and velocity characterization:<br>Individual exercise and group discussion (FB, FS, YH, LR) |
| 19:00 – 20:00 | Dinner                                                                                                                                      |

|               |                                                                      |
|---------------|----------------------------------------------------------------------|
| 20:30 – 20:45 | Individual project presentation (10 min) and question time (5 min) * |
| 20:45 – 21:00 | Individual project presentation (10 min) and question time (5 min)   |
| 21:00 – 21:15 | Individual project presentation (10 min) and question time (5 min)   |

\*On a voluntary basis, each student gives an informal presentation on his/her PhD/MSc project.

#### **Thursday, 3 September: Conference Room @ Naturatrafoi**

|               |                                                                                                                                                         |
|---------------|---------------------------------------------------------------------------------------------------------------------------------------------------------|
| 7:30 – 8:15   | Breakfast                                                                                                                                               |
| 8:30 – 9:15   | Lecture: InSAR-based Kinematic Attribute and Activity:<br>Rules and demo (LR, YH)                                                                       |
| 9:30 – 10:15  | Laboratory: Individual exercise on InSAR-based KA/Activity and discussion<br>(FB, FS, YH, LR)                                                           |
| 10:15 – 10:40 | Break                                                                                                                                                   |
| 10:40 – 11:30 | Lecture: Introduction to upslope connection, units, and systems                                                                                         |
| 11:30 – 12:30 | Laboratory: Kinematic-based revision of rock glacier detection and outline<br>delineation, including subdivision of systems into units (FB, FS, YH, LR) |
| 12:45 – 13:45 | Lunch                                                                                                                                                   |
| 14:30 – 16:00 | Lecture: The use of UAVs for monitoring rock glaciers<br>Background and case studies (SV, JM)                                                           |
| 16:00 – 16:15 | Short Break                                                                                                                                             |
| 16:15 – 18:00 | Lecture: Introduction to geophysical methods for soil prospecting<br>Electrical resistivity tomography (ERT) in periglacial terrain (JB)                |
| 18:00 – 18:15 | Individual project presentation (10 min) and question time (5 min)                                                                                      |
| 18:15 – 18:30 | Individual project presentation (10 min) and question time (5 min)                                                                                      |
| 18:30 – 18:45 | Individual project presentation (10 min) and question time (5 min)                                                                                      |
| 19:00 – 20:00 | Dinner                                                                                                                                                  |
| 20:15 – 21:30 | Guest seminar: Extracting Rock Glacier Velocity time series from DInSAR<br>information (Philipp Bernhard, Gamma RS)                                     |

#### **Friday, 4 September: Zay Valley (outdoor)**

|               |                                                  |
|---------------|--------------------------------------------------|
| 7:30 – 8:15   | Breakfast                                        |
| 8:30 – 18:00  | Field activities (part 1): All trainers involved |
| 19:00 – 20:00 | Dinner                                           |

#### **Saturday, 5 September: Conference Room @ Naturatrafoi**

|               |                                                                                                           |
|---------------|-----------------------------------------------------------------------------------------------------------|
| 7:30 – 8:15   | Breakfast                                                                                                 |
| 8:30 – 10:30  | Laboratory: Processing and inverting electrical data with the free, Python-<br>based software ResiPy (JB) |
| 10:30 – 11:00 | Break                                                                                                     |
| 11:00 – 12:30 | Lecture: Permafrost and rock glacier studies in the Southern Carpathians (FS)                             |

|               |                                                                                                                                                            |
|---------------|------------------------------------------------------------------------------------------------------------------------------------------------------------|
|               | Laboratory: Post-fieldwork RGIK characterization: Practical assignment of the remaining attributes and revision based on field observations (all trainers) |
| 12:30 – 13:30 | Lunch                                                                                                                                                      |
| 14:00 – 14:45 | PermaCOST and RGIK initiatives (LR)                                                                                                                        |
| 14:45 – 15:00 | Individual project presentation (10 min) and question time (5 min)                                                                                         |
| 15:00 – 15:15 | Individual project presentation (10 min) and question time (5 min)                                                                                         |
| 15:15 – 15:30 | Individual project presentation (10 min) and question time (5 min)                                                                                         |
|               | Break                                                                                                                                                      |
| 17:00 – 18:30 | Lab exercise (part 1): UAV data processing (SV, JM)                                                                                                        |
| 19:00 – 20:00 | Dinner                                                                                                                                                     |

### **Sunday, 6 September: Conference Room @ Naturatrafoi**

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|---------------|------------------------------------------------------------------------------------------------------------------------------------|
| 7:30 – 8:15   | Breakfast                                                                                                                          |
| 8:30 – 10:15  | Lab exercise (part 2): UAV data processing: feature tracking and DoD (SV, JM)                                                      |
| 10:15 – 10:45 | Break                                                                                                                              |
| 10:45 – 12:00 | Seminar: Rock glacier distribution and dynamics in the broader geomorphic context of South Tyrol (FB)                              |
| 12:30 - 13:30 | Lunch                                                                                                                              |
| 14:00 – 15:30 | A sneak peek at the RoGI exercise outputs. Discussion, questions and (maybe) answers (FB, LR, YH)                                  |
| 15:30 – 15:45 | Individual project presentation (10 min) and question time (5 min)                                                                 |
| 15:45 – 16:00 | Individual project presentation (10 min) and question time (5 min)                                                                 |
| 16:15 – 18:30 | Excursion to Tre Fontane/Drei Brunnen: Debris flows, channel aggradation, and sediment management at the base of Mount Ortles (FB) |
| 19:00 – 20:30 | Dinner                                                                                                                             |
|               | End of School                                                                                                                      |

### **Monday, 7 September**

Breakfast, morning check-out and departure