Impressions from the Matsch/Mazia valley, part of the Inner-Alpine dry valley system Vinschgau/Val Venosta (South Tyrol, Northern Italy)

Photos and text by Andreas Hilpold, Michael Steinwandter, Elia Guariento, Manuel Pramsohler & Julia Seeber

Institute for Alpine Environment, Eurac Research, Drusus-Allee 1, 39100 Bozen /Bolzano, Italy; e-mail: andreas.hilpold@eurac.edu

The Matsch/Mazia Valley is a small tributary valley of the Vinschgau Valley (Val Venosta), the most extreme inner-Alpine dry valley of the Eastern Alps (Braun-Blanquet 1961). Due to large barriers in the South (Ortles/Ortler Group) and in the North (Ötztal Alps) there is little precipitation, mainly during the summer months. Mals/Malles and Schluderns/Sluderno, villages at the southern entrance of the Matsch Valley, have only about 500 mm of rainfall per year.

The area looks back on a long pastoral tradition, resulting in large areas of dry pastures, mainly located on the northern (i.e. S-exposed) slopes of the Vinschgau and the Matsch Valleys, which therefore have a distinct steppe character. Especially in the latter, dry meadows represent a smooth transition to grazed alpine meadows. In the montane belt we can therefore find elements of alpine flora and fauna merged with typical dry meadow species. The area is part of the south-western end of the Ötztal Alps, thus consisting of predominantly metamorphic bedrock with only limited sediment packages (containing also material of different origin) at the entrance of the valley. Only small areas of the dry meadows in the Vinschgau and Matsch/Mazia Valleys are protected (to a large extent as Natura 2000 areas). Phytosociologically, dry meadows of the Vinschgau valley belong predominantly to the alliance Stipo-Poion xerophilae (within Festucetalia valesiaceae).

Literature:

Stipa grasslands, mainly with Stipa eriocalis and Stipa capillata. Photo: A. Hilpold.
Landscape in the Matsch/Mazia Valley. Photo: A. Hilpold.

Sites with nitrophilous plants, *Marrubium vulgare* and *Onopordum acanthium*. Photo: A. Hilpold.

Butterflies: *Plebejus argus* (Photo: A. Hilpold) and *Plebejus trappi* (Photo: A. Hilpold), the latter one feeds on the rare steppe species *Astragalus exscapus* and is an endemic species of the inner-Alpine dry valleys. *Parnassius apollo* (Photo: M. Steinwandter), *Pyrgus carthami* (Photo: A. Hilpold), *Pyrgus serratulae* (Photo: A. Hilpold).

Insects: *Stenobothrus nigromaculatus* (Photo: A. Hilpold) is a steppe species restricted to the most dry valleys of the Alps and has its center of distribution in Eastern Europe and Central Asia, *Zygaena carniolica* (Photo: M. Steinwandter), *Mantis religiosa* (Photo: E. Guariento).