

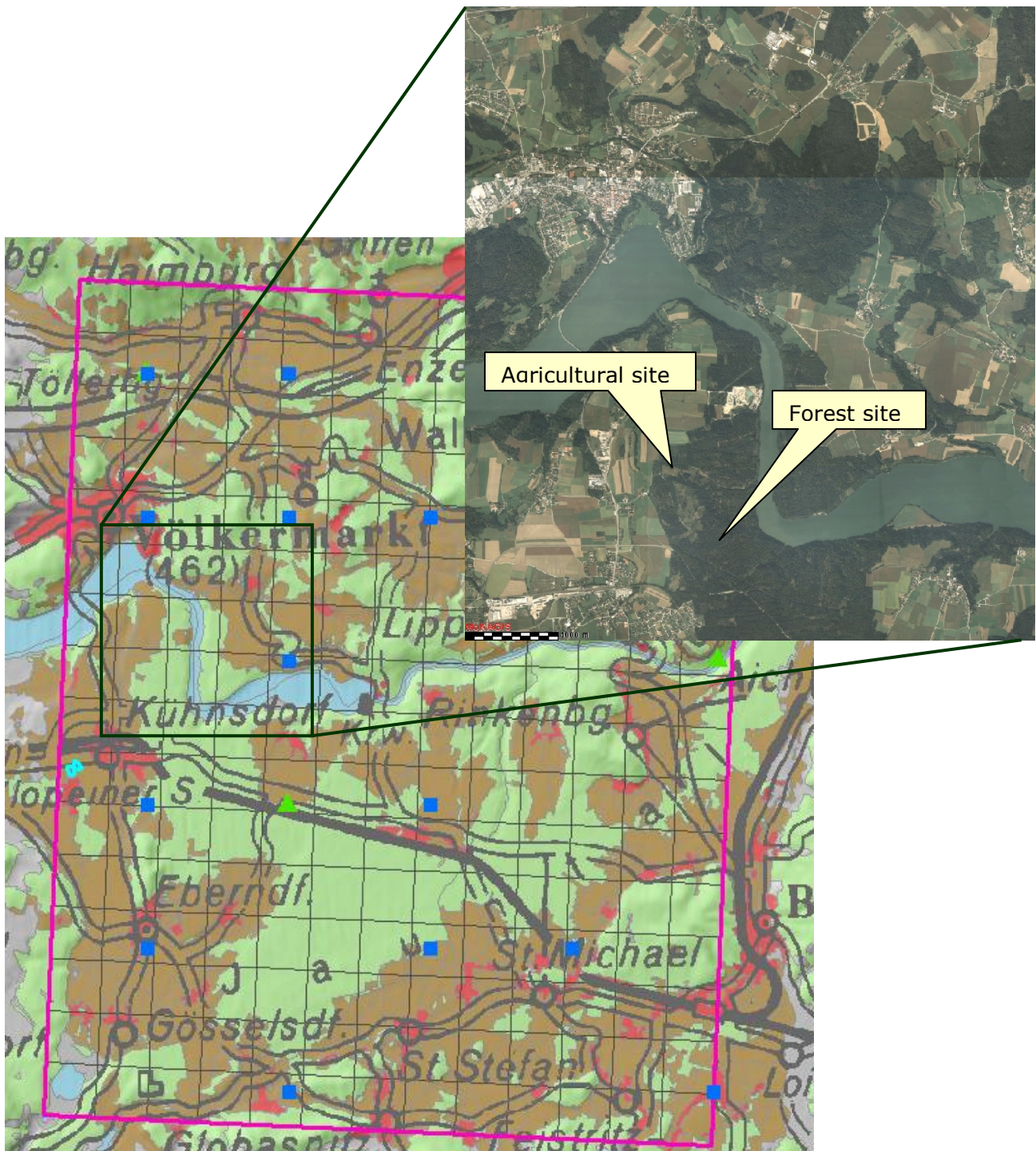
# ECALP PROJECT

## Austria -Veneto Excursion

### LOCATION OF THE AUSTRIAN EXCURSION POINTS

(Dobrowa region, Carinthia)

MAY 4, 2005



## Description of the excursion points

The excursion points are located in an inner alpine basin in the province of Carinthia, in the south of Austria. The altitude of this region is about 450 m a.s.l.

The main **parent material**, especially in the flat basin area, is fine and coarse moraine and/or fluviatile material, primarily from acid metamorphic rocks (phyllite, schist), which is weathered to a depth of more than 50 cm. Partly, the moraine material is packed with fine calcareous material. The areas of higher altitudes are located in the northern part of the pilot area.

The most widespread **soils** in this region are Dystric Cambisols, with rather biological inactive mor humus at forest sites. Below 20 cm soil depth roots are sparse and profile morphology shows little differentiation.

The **climate** is characterized by frequent temperature inversions, the average temperature in January is -4.9°C (table 1), the average temperature calculated over the year is 7.9°C for this region. Precipitation averages about 1000 mm·year<sup>-1</sup> (table 2).

**Table 1: Mean temperatures (°C) - St. Kanzian at the Lake Klopein (450m)**

J	F	M	A	M	J	J	A	S	O	N	D	mean
-4.9	-2.8	3.3	8.6	14.1	17.3	19.3	18.1	14.2	8.6	2.4	-2.6	7.9

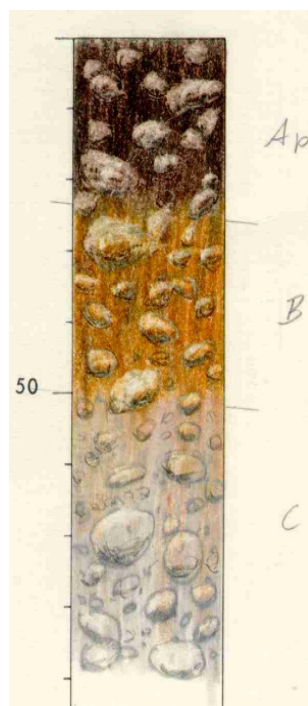
**Table 2: Average precipitation (%) - St. Kanzian at the Lake Klopein (450m)**

J	F	M	A	M	J	J	A	S	O	N	D	mean
46	40	56	85	101	119	112	136	113	102	80	61	1051

## Agricultural Site (source: Agricultural soil map 1:25.000, BFW)

The agricultural site refers to the STU 27 (Bodenform 27) of the surveying district "EBERNDORF-EISENKAPPL". The whole district covers about 39,900 ha, where about 8,340 ha are under agricultural use and mapped. This soil type covers about 15.1% (1.258ha) of this region.

### Soil profile description:



#### ÖBS: Entkalkte Lockersediment-Braunerde (Lbe)

WRB: Mollic, eutric Cambisol (CMmoeu)

Ap: 0 – 25 cm: loamy sand, coarse material 20 – 40% (gravel up to 15 cm Ø), no carbonate, humous content 1,5 - 4%; good root penetration, low biological activity,

B: 25 – 50 cm: loamy sand; coarse material 20 – 40% (gravel up to 15 cm Ø); no carbonate, low root penetration, low biological activity

C: > 50 cm: parent material, coarse material > 70%, no roots, no biological activity

Parent material: predominately coarse moraine and fluvatile material

Table 3 : Analytical parameters of the soil profile

Horizon cm	Soil Texture %			Humus (Walkley) %	Carbonate %	pH (0.01m CaCl <sub>2</sub> )
	2.0 – 0.06 mm	0.06-0.002 mm	< 0.002 mm			
0-10	42	48	10	2.9	0.0	5.8
10 - 40	62	27	11	0.5	0.0	5.9

Table 4 : Exchange Format according to the described STU

Parameter	Code	Description
AGRI-USE	1	Agricultural use
AGLIM1	2	Gravelly (over 35% gravel diameter < 7.5)
AGLIM2	1	No limitation to agricultural use
IL	3	Impermeable layer between 40 – 80 cm
ROO	4	Obstacle to roots between 20 – 40 cm
TOP-DEP	25	

<b>TEXT-TOP-DOM</b>	2	Medium (18% < clay < 35 % and sand > 15%, or clay <18% and 15% < sand <65%)
<b>TEXT-TOP-SEC</b>		
<b>TEXT-SUB-DOM</b>	2	Medium (18% < clay < 35 % and sand > 15%, or clay <18% and 15% < sand <65%)
<b>TEXT-SUB-SEC</b>		
<b>PAR-MAT-DOM-AR</b>	5312	river terrace gravel
<b>PAR-MAT-SEC-AR</b>		
<b>WM1</b>	2	No water management system
<b>WM2</b>	2	No water management system
<b>WR</b>	1	Wet within 80 cm for 3 to 6 months, but not wet within 40 cm for over 1 month
<b>WRB-ADJ1</b>	mo	Mollic
<b>WRB-ADJ2</b>	eu	Eutric
<b>WRB-LEV1</b>	CM	Cambisol
<b>WRB-FULL</b>	CMmoeu	

### Forest Site:

See attached article.