

**Appendix 5.** Model selection for  $\alpha$ -diversity as well as for  $\beta$ -diversity across scales. AICc = Akaike information criterion corrected for small sample sizes;  $\Delta$  AICc = difference ( $\Delta$ ) in AICc value of a certain model and minimum AICc value registered;  $w$  = Akaike weights (probability that a given model is the best in whole set). Only models with  $\Delta$  AICc < 2 are provided.

Variable	$\Delta$ AICc	$w$
<b>1 cm<sup>2</sup></b>		
Prec	0.00	0.503
Alt	0.91	0.167
Hload	1.84	0.105
EIV-R	1.95	0.099
<b>10 cm<sup>2</sup></b>		
Grazed vs. mown, Prec	0.00	0.236
Grazed vs. mown	0.06	0.229
Hload, grazed vs. mown	1.10	0.137
Hload, grazed vs. mown, Prec	1.51	0.111
Alt, grazed vs. mown	1.52	0.111
Alt, grazed vs. mown, Tmean	1.96	0.089
Grazed vs. mown, Prec	1.99	0.087
<b>100 cm<sup>2</sup></b>		
Alt, Hload, grazed vs. mown	0.00	0.491
Alt, grazed vs. mown	1.13	0.278
Hload, grazed vs. mown	1.51	0.231
<b>1000 cm<sup>2</sup></b>		
Alt, Hload, grazed vs. mown	0.00	0.472
Alt, Hload, grazed vs. mown, Tmean	0.99	0.288
Alt, Hload, grazed vs. mown, EIV-R	1.34	0.241
<b>1 m<sup>2</sup></b>		
Alt, Hload, Tmean, grazed vs. mown	0.00	0.195
Alt, Hload, EIV-R, Tmean, grazed vs. mown	0.32	0.166
Alt, Hload, grazed vs. mown	1.12	0.112
Alt, Hload, EIV-R, grazed vs. mown	1.35	0.100
Alt, Hload, Tmean, grazed vs. mown, grazed vs. unused	1.45	0.095
Alt, Hload, Prec, EIV-R, Tmean, grazed vs. mown	1.51	0.092
Alt, Hload, Prec, Tmean, grazed vs. mown	1.52	0.091
Alt, Hload, EIV-N, Tmean, grazed vs. mown	1.89	0.076
Alt, Hload, EIV-R, Tmean, grazed vs. mown, grazed vs. unused	1.92	0.075
<b>10 m<sup>2</sup></b>		
Alt, Hload, EIV-N, grazed vs. mown	0.00	0.535
Alt, Hload, EIV-N, EIV-R, grazed vs. mown	1.39	0.267
Alt, Hload, EIV-N, Prec, grazed vs. mown	1.99	0.198
<b>100 m<sup>2</sup></b>		
Alt, Hload, EIV-N, grazed vs. mown	0.00	0.148
Hload, grazed vs. mown	0.60	0.110
Alt, Hload, EIV-R, grazed vs. mown	0.67	0.106
Alt, Hload, grazed vs. mown	0.96	0.092
Alt, Hload, EIV-N, EIV-R, grazed vs. mown	1.04	0.088
Hload, grazed vs. mown, Tmean	1.19	0.082
Alt, Hload, EIV-N, grazed vs. mown, Tmean	1.43	0.072
Alt, Hload, Prec, grazed vs. mown	1.61	0.066
Hload, EIV-N, grazed vs. mown	1.68	0.064

Hload, EIV-R, grazed vs. mown	1.88	0.058
Hload, EIV-N, grazed vs. mown, Tmean	1.94	0.056
Alt, Hload, EIV-N, Prec, grazed vs. mown	1.93	0.055
<b>Total z-values</b>		
EIV-N, EIV-R, Tmean	0.00	0.293
Alt, EIV-N, EIV-R, Tmean	0.16	0.270
EIV-N, EIV-R, Tmean, grazed vs. unused	1.25	0.157
Alt, EIV-N, Tmean	1.45	0.142
EIV-N, Prec, EIV-R, Tmean	1.50	0.138