

**APPENDIX A** – Supplementary Material.

**Table 1.** — Home range (KI90) and core area (KI50) sizes of European rabbits (mean  $\pm$  SE, and minimum-maximum) with respect to area, season and sex in the Doñana National Park, Spain. N represents the number of radiotracked rabbits.

	N	KI90 (ha)	KI50 (ha)
<i>Area</i>			
Scrubland	10	0.95 $\pm$ 0.13 (0.47-1.87)	0.18 $\pm$ 0.04 (0.06-0.55)
Ecotone	14	0.68 $\pm$ 0.07 (0.21-1.02)	0.12 $\pm$ 0.01 (0.05-0.18)
Grassland	11	1.46 $\pm$ 0.18 (0.85-2.59)	0.31 $\pm$ 0.03 (0.18-0.59)
<i>Season</i>			
Spring	17	1.15 $\pm$ 0.12 (0.52-2.18)	0.23 $\pm$ 0.03 (0.08-0.49)
Summer	22	0.79 $\pm$ 0.14 (0.19-3.33)	0.14 $\pm$ 0.02 (0.02-0.36)
Autumn	21	0.77 $\pm$ 0.12 (0.08-2.42)	0.12 $\pm$ 0.02 (0.01-0.31)
Winter	15	0.78 $\pm$ 0.11 (0.27-1.72)	0.15 $\pm$ 0.02 (0.04-0.42)
<i>Sex</i>			
Male	15	1.14 $\pm$ 0.14 (0.40-2.56)	0.17 $\pm$ 0.02 (0.04-0.49)
Female	20	0.90 $\pm$ 0.12 (0.22-2.60)	0.15 $\pm$ 0.01 (0.01-0.42)

**Table 2.** — Availability and use by the European rabbit of different habitat types in three areas in south-west Spain. Values are percentage means  $\pm$  SE. Sample size (N) represents number of rabbits for the home range composition and number of radiolocations for the habitat use within home ranges. Habitat availability in the study areas was measured inside polygons that encompassed all radio-locations of rabbits in each area and provides information on the percentage of each habitat type. Home range composition represents the percentage of each habitat type within home ranges and is taken as the used fraction at home range level, and as the available fraction within home ranges.

Habitat type	Habitat availability (study area)	Home range composition	Habitat use within home ranges	
			Day	Night
<i>Scrubland</i>		N = 10	N = 1208	N = 283
Scrub	45.8	51.7 $\pm$ 5.3	50.7 $\pm$ 6.1	54.4 $\pm$ 6.9
Bushes	44.5	36.6 $\pm$ 4.5	35.2 $\pm$ 6.1	33.6 $\pm$ 6.2
Pastures	9.7	11.7 $\pm$ 1.0	14.1 $\pm$ 3.6	12.0 $\pm$ 3.1
<i>Ecotone</i>		N = 14	N = 911	N = 174
Scrub	15.5	15.4 $\pm$ 4.8	12.2 $\pm$ 6.5	21.7 $\pm$ 13.8
Bushes	30.5	57.5 $\pm$ 5.0	54.6 $\pm$ 6.6	45.9 $\pm$ 9.4
Pastures	41	26.7 $\pm$ 2.4	33.2 $\pm$ 4.7	32.4 $\pm$ 6.8
Flooded areas	13	0.4 $\pm$ 0.3		
<i>Grassland</i>		N = 11	N = 873	N = 172
Scrub	17.4	32.2 $\pm$ 4.7	42.6 $\pm$ 6.3	34.0 $\pm$ 7.5
Pastures	79.8	67.8 $\pm$ 4.7	57.4 $\pm$ 6.3	66.0 $\pm$ 7.5
Flooded areas <sup>a</sup>	2.8			

<sup>a</sup> Flooded areas not present in the home ranges

**Table 3.** — The Jacobs index (mean  $\pm$  SE) for habitat preference of rabbits in the Doñana National Park, Spain, at home range level and within home ranges (day and night) in scrubland, ecotone and grassland. N represents the number of radiotracked rabbits. The Jacobs (1974) preference index (Jacobs 1974) ranges between  $-1$  (maximum avoidance) and  $+1$  (maximum preference) and is zero when habitat use and availability are equal. Each habitat type was considered significantly as being preferred or avoided if its mean value on the Jacobs index was positive or negative, respectively, and significantly different from zero ( $P < 0.05$ ). Statistical significance (indicated with asterisks) was tested under the  $t$ -distribution with  $n-1$  degrees of freedom, where  $n$  was the number of home ranges used in the analysis.

<i>Home range selection</i>					
	N	scrub patches	bush patches	pasture patches	flooded patches
Scrubland	10	0.108 $\pm$ 0.107	-0.170 $\pm$ 0.093	0.080 $\pm$ 0.06	—
Ecotone	14	-0.198 $\pm$ 0.125	0.461 $\pm$ 0.103*	-0.320 $\pm$ 0.05	-0.959 $\pm$ 0.033*
Grassland	11	0.289 $\pm$ 0.127	—	-0.217 $\pm$ 0.127	-1*
<i>Habitat selection within home ranges</i>					
	N	scrub patches	bush patches	pasture patches	
<i>Scrubland</i>					
Day	10	-0.021 $\pm$ 0.072	-0.046 $\pm$ 0.057	0.018 $\pm$ 0.110	
Night	9	0.061 $\pm$ 0.097	-0.086 $\pm$ 0.087	-0.075 $\pm$ 0.109	
<i>Ecotone</i>					
Day	14	-0.503 $\pm$ 0.125	-0.072 $\pm$ 0.091	0.104 $\pm$ 0.095	
Night	5	-0.325 $\pm$ 0.277	-0.095 $\pm$ 0.148	0.121 $\pm$ 0.166	
<i>Grassland</i>					
Day	11	0.216 $\pm$ 0.043	—	-0.216 $\pm$ 0.043	
Night	5	0.095 $\pm$ 0.126	—	-0.095 $\pm$ 0.126	