

Supplementary information. Tests for seasonal changes over time.

We quantified temporal changes in colouration of adults through the breeding season. We excluded moulting individuals from the analysis. Colouration parameters from the throat and chest of 12 adult males were calculated during (April 2007) and after (May 2007) the breeding season and analysed with paired Student's *t*-tests. We also tested if female colouration was altered during the gestation by comparing spectral data from 17 females before copulation (April 2012) and after oviposition (June 2012). To do this, we first captured virgin females and measured their ventral colouration. Each female was presented to several males in the laboratory to ensure mating, and all females were then released in outdoor enclosures. At the end of gestation, females were recaptured and their ventral colouration was quantified again after egg laying. We found that spectral parameter values from the chest were stable over time in both sexes (see Table S1 below), except for females' UV hue that showed very little variation among individuals (Table S1, Figure S1). This was not the case for spectral parameters from the throat. In females, brightness, VIS hue and yellow chroma on the throat did not change significantly through time, but UV hue and chroma were lower after gestation (Figure S1). Yet, inter-individual variation for UV components in females was consistent through time (Table 1, Figure S1). In males, brightness, yellow chroma and UV chroma on the throat changed significantly between periods (Table S1). Brightness increased and yellow chroma decreased during spring, and interindividual differences in these two parameters were not consistent (Figure S1), maybe as a result of improved nutritional status of males after mating. UV chroma was higher after the breeding and variation for UV chroma in males was consistent through time. Altogether, these analyses suggest weak seasonal changes in colouration shortly after mating relative to the variation observed between age and sex classes (see below), and mostly consistent interindividual variation during this period.

Table S1. Intra-individual variability in colouration during the breeding season in males and females. The correlation coefficient (r) measures the correlation between measurements taken on the same individual during and after mating, and significant terms are bolded. The significance of the intra-individual change is tested with paired Student t tests (t value and associated p value) against the null hypothesis. Significant Paired t tests are bolded.

		Throat			Chest		
		<i>r</i>	<i>t</i>	<i>P</i>	<i>r</i>	<i>t</i>	<i>P</i>
Gravid females N=17	Brightness	0.57	0.29	0.78	0.36	1.83	0.08
	VIS hue	0.36	2.03	0.06	0.77	0.69	0.5
	Yellow chroma	0.87	0.34	0.74	0.75	2.14	0.06
	UV hue	0.64	3.96	<0.001	0.38	-4.46	<0.001
	UV chroma	0.81	2.83	0.01	-0.001	0.08	0.94
Males N=12	Brightness	0.15	-4.54	<0.001	0.64	-0.62	0.55
	VIS hue	0.61	0.99	0.35	0.72	0.82	0.43
	Yellow chroma	0.57	2.86	0.02	0.55	0.57	0.58
	UV hue	0.65	0.96	0.35	-0.01	-0.65	0.53
	UV chroma	0.7	-3.02	0.01	0.38	-0.93	0.37

Figure S1. Multiple plots representing the mean spectral parameters of gravid females and males during and after the breeding season on the throat (empty circles) and the chest (black triangles). Errors bars are the standard error of the mean.

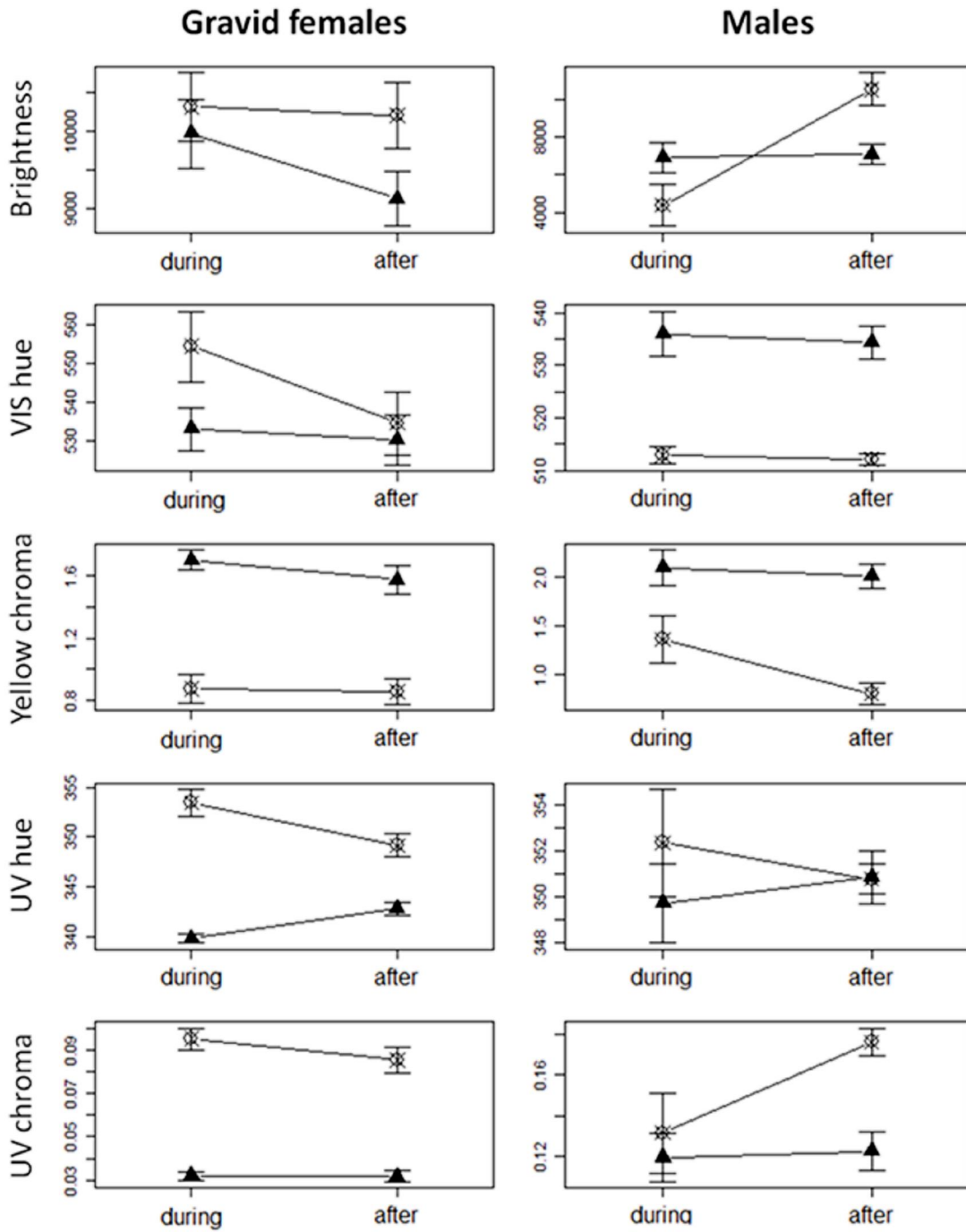


Table S2. Matrix of Pearson correlations between spectral parameters on the throat (in the lower left triangle) and on the CBR (in the upper right triangle) in adult common lizards. Stars represent significant correlations with p -value < 0.05.

Correlated with	Brightness	VIS hue	Yellow chroma	UV hue	UV chroma
Brightness	1	-0.25*	-0.56*	-0.43*	-0.38*
VIS hue	-0.01	1	-0.68*	-0.30*	-0.37*
Yellow chroma	-0.30*	0.20*	1	0.32*	0.26*
UV hue	0.18*	-0.08	-0.41*	1	0.65*
UV chroma	0.20*	0.21*	-0.60*	0.34*	1