

Supplementary material to:

M Javal , O Le Moëne , C Smit , DE Conlong and JS Terblanche

A preliminary assessment of the physiological and morphological correlates of beetle aggression in an emerging sugarcane pest, *Cacosceles newmannii* (Thomson, 1877) (Coleoptera: Cerambycidae)

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Table s1. Pearson correlation coefficients for adult *Cacosceles newmannii* males (orange, bottom section) and females (blue, top section).

Significant values ($P < 0.05$) appear in bold with an asterisk.

	Mandible Length	Head Width	Elytra Width	Elytra Length	Total Length	Dry Mass	RMR
Mandible Length		0.73*	0.68*	0.63*	0.66*	0.53*	-
Head Width	0.90*		0.89*	0.84*	0.86*	0.76*	-
Elytra Width	0.91*	0.91*		0.86*	0.89*	0.78*	-
Elytra Length	0.89*	0.89*	0.94*		0.91*	0.74*	-
Total Length	0.95*	0.93*	0.95*	0.94*		0.80*	-
Dry Mass	0.92*	0.88*	0.91*	0.91*	0.94*		-
RMR	0.57*	0.54*	0.58*	0.54*	0.61*	0.27	

Table s2. Linear regression of morphological and physiological variables in relation to total body length, for male and female *Cacosceles newmannii*. *F* and *P* values are given for the sex × total length interaction, and indicate the significance of the difference between the slopes for each sex (ANCOVA, homogeneity of slopes model). The test was not applicable to the RMR due to the small number of females sampled. Significant *P*-values are given in bold, and *n* values are given in Table 1.

Dependant variable	Female		Male		<i>F</i>	<i>P</i>
	Equation	<i>R</i> ²	Equation	<i>R</i> ²		
Mandible Length	$y = 0.1066x + 0.3725$	0.4294	$y = 0.3841x - 6.7739$	0.8982	236.726	< 0.0001
Head Width	$y = 0.1532x + 1.577$	0.734	$y = 0.1814x + 1.2576$	0.8669	6.374	0.012
Elytra Width	$y = 0.2808x + 1.5281$	0.787	$y = 0.2664x + 1.1857$	0.9115	0.882	0.348
Elytra Length	$y = 0.6267x + 0.8519$	0.8359	$y = 0.4043x + 6.4082$	0.8921	63.03	< 0.0001
Dry Mass	$y = 0.0618x - 1.7967$	0.6433	$y = 0.0331x - 0.8042$	0.8789	48.984	< 0.0001
RMR	$y = -0.2946x + 12.917$	0.3573	$y = 0.1047x - 2.3159$	0.3685		