## Random Forest Field validation: model results <sup>1</sup> Linear model effects of Eimeria infection variables on predicted weight loss

Model/Effect	Comparison	n	Effect Size <sup>2</sup>	SE	p-value	Model R <sup>2</sup>	F-test p
Species-Specific Effects							
Species Model: E. ferrisi	vs Uninfected	169	+1.25%	0.428	0.004	0.082	<0.001
Species Model: E. falciformis	vs Uninfected	169	+2.06%	0.686	0.003	0.082	<0.001
Infection Detection							
Infection Status Effect	Infected vs Uninfected	305	+1.15%	0.279	<0.001	0.053	<0.001

 $<sup>^{1}</sup>$  All models: predicted\_weight\_loss  $\sim$  infection\_variable. Positive values indicate infected mice have higher predicted weight loss

<sup>&</sup>lt;sup>2</sup> Effect size represents increase in predicted weight loss for infected mice compared to uninfected controls