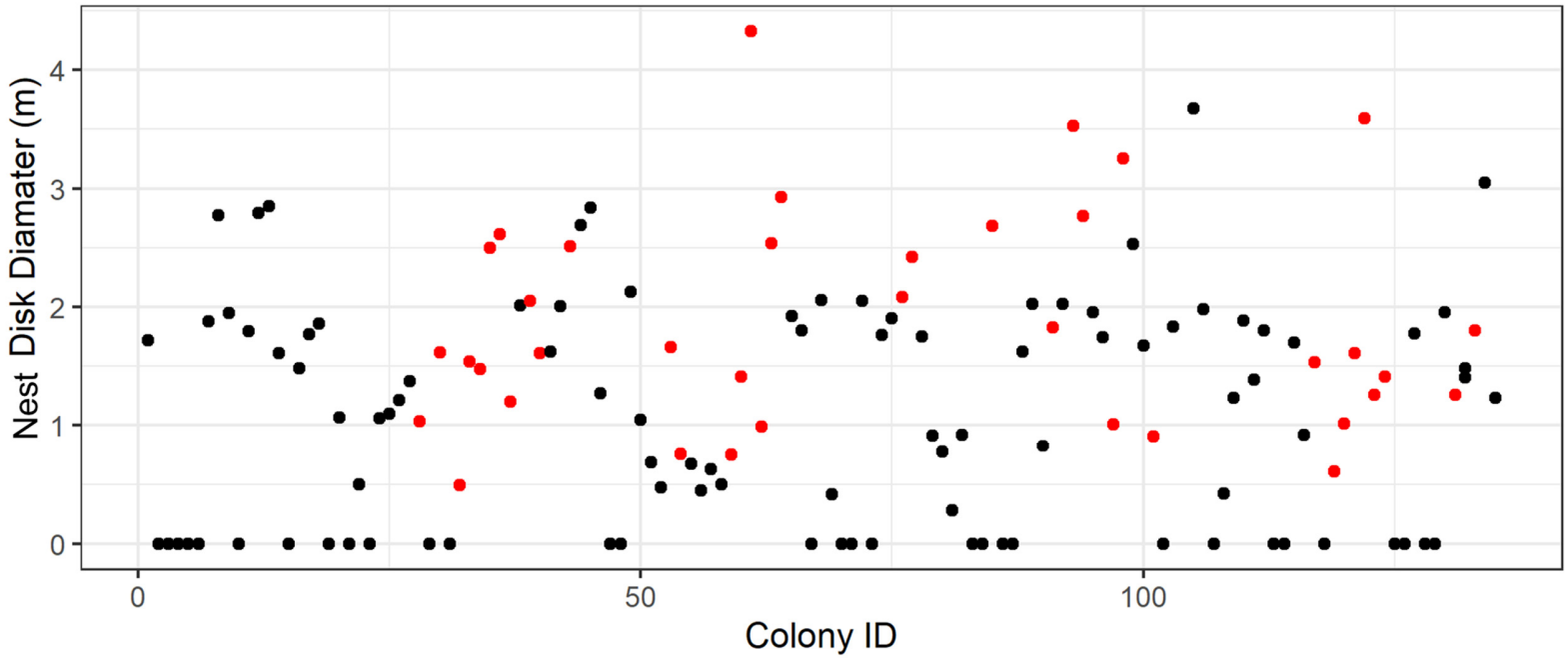


Figure S1. Red harvester ant (*Pogonomyrmex barbatus* F. Smith [Hymenoptera: Formicidae: Myrmicinae]) nest disc diameter. Each colony unique identification number (x axis) is listed with the corresponding disc size (y-axis). Nest disc size is generally positively associated with approximate colony size and age. Colonies selected for use in the seed preference study are denoted in red.

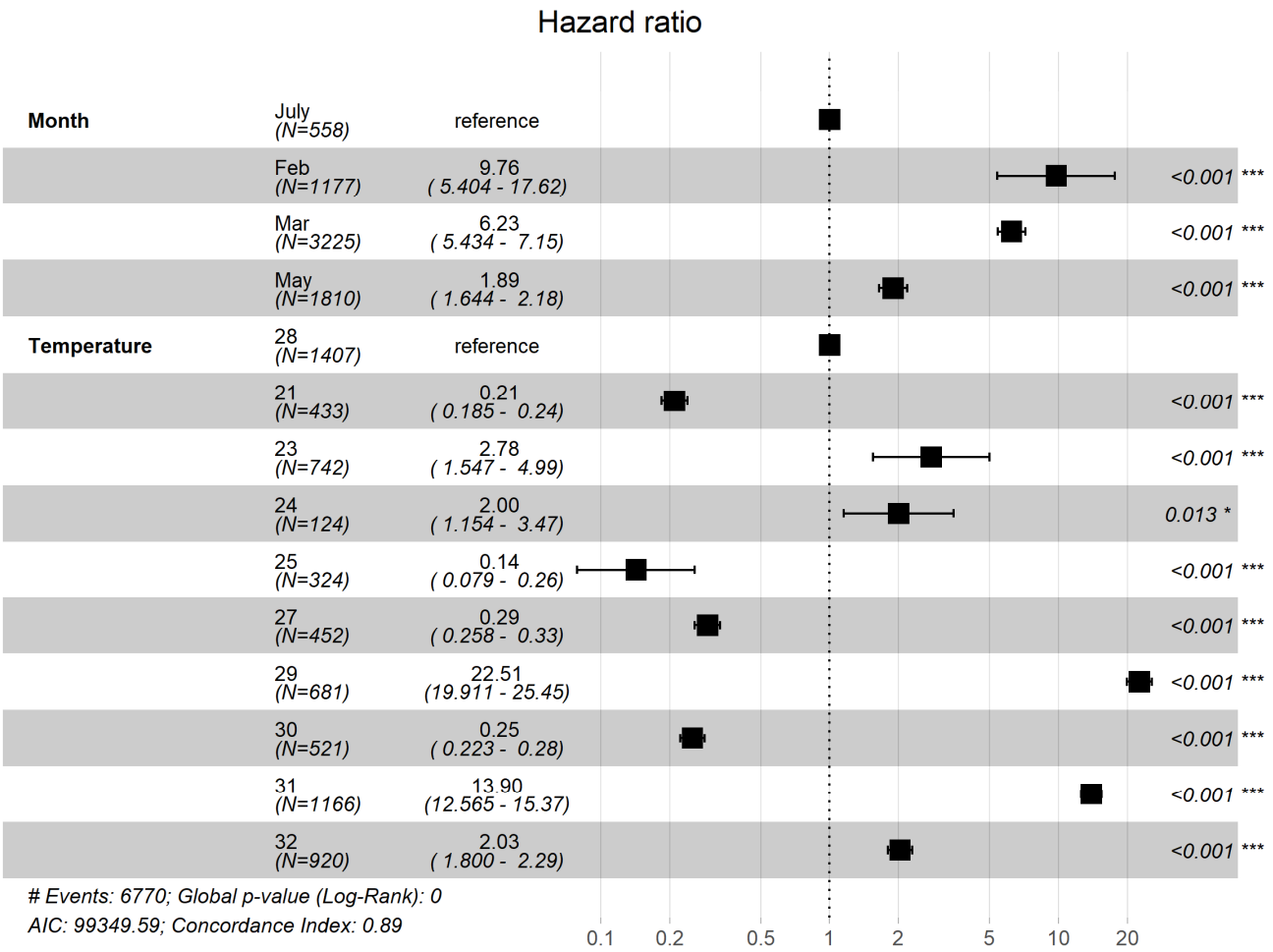


Figure S2. Hazard ratio test demonstrating differences among individual sampling months and temperatures (°C) during the cover crop seed preference trials. Differences in month n (observed seed number) was due to differences in numbers of trials per month and temperatures at the time of seed count as well as censorship due to external events.

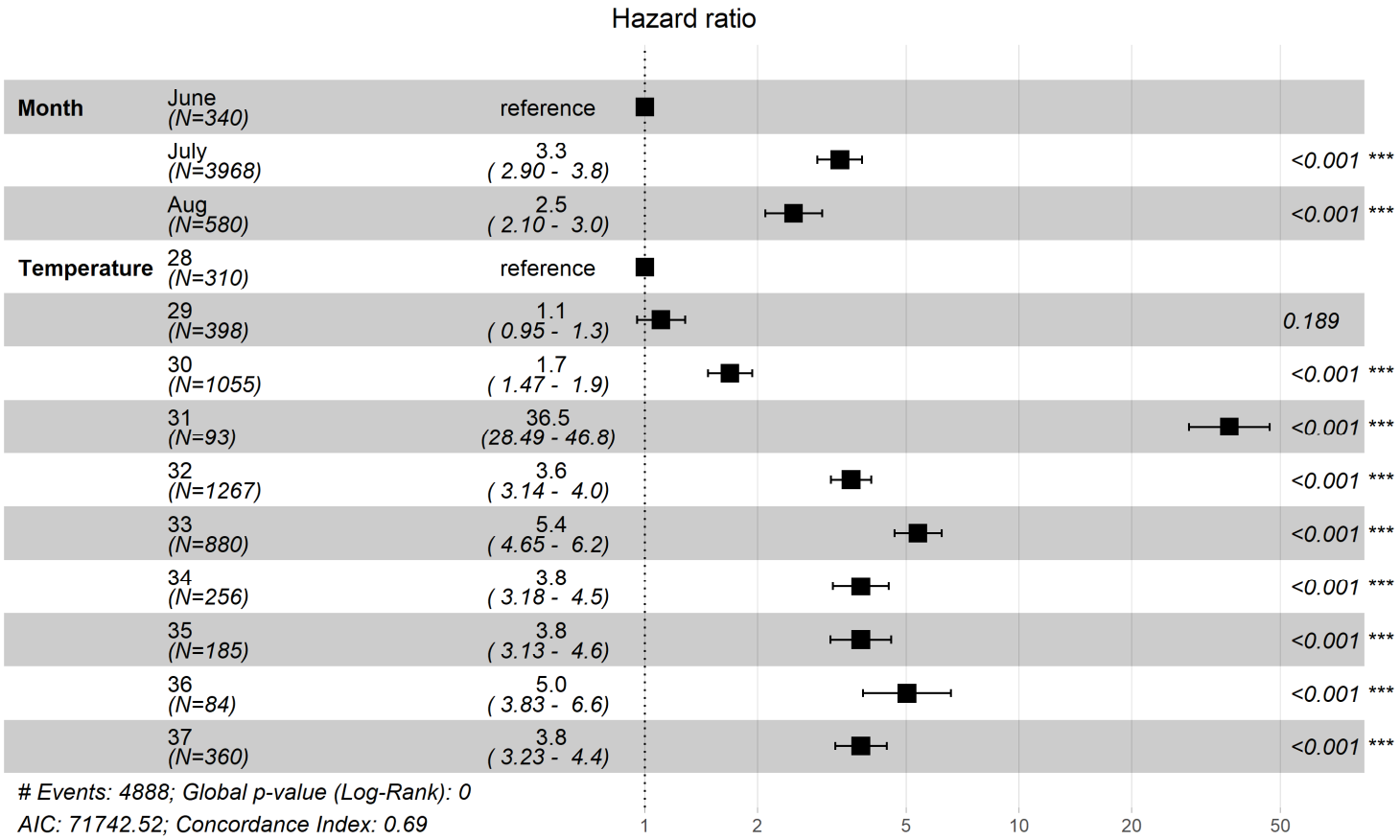


Figure S3. Hazard ratio test demonstrating differences among individual sampling months and temperatures (°C) during the cover crop seed preference trials. Differences in month n (observed seed number) was due to differences in numbers of trials per month and temperatures at the time of seed count as well as censorship due to external events.

Table S1. Detailed model output of the fitted Cox proportional hazards model for the cover crop seed preference trials. The model intercept includes wheatgrass (seed type), June (month), and 28 °C (temperature) for ease of comparison across trial types. Coef indicates variable coefficients, Exp(Coef) indicates the exponential of the coefficient values, SE indicates the standard error, *Z* is the test statistic used, and *P* indicates the significant values.

Category	Variable	Coef	Exp(Coef)	SE	*Z*	*P*
Seed Type	Vetch	-0.149	0.860	0.043	-3.411	<0.001
	Oat	-0.044	0.956	0.038	-1.153	0.248
	Sunn Hemp	-0.161	0.850	0.042	-3.847	<0.001
	Radish	-0.060	0.940	0.038	-1.586	0.112
	Fescue	-0.107	0.898	0.041	-2.581	0.009
Month	Feb	2.277	9.756	0.301	7.556	<0.001
	Mar	1.829	6.230	0.069	26.191	<0.001
	May	0.638	1.893	0.071	8.876	<0.001
Temp (°C)	21	-1.558	0.210	0.065	-23.662	<0.001
	23	1.022	2.779	0.065	3.421	<0.001
	24	0.694	2.001	0.280	2.471	0.013
	25	-1.946	0.142	0.301	-6.449	<0.001
	27	-1.227	0.293	0.065	-18.847	<0.001
	29	3.114	22.512	0.062	49.707	<0.001
	30	-1.379	0.251	0.062	-21.975	<0.001
	31	2.631	13.897	0.051	51.189	<0.001
	32	0.709	2.032	0.061	11.438	<0.001

Table S2. Detailed model output of the fitted Cox proportional hazards model for the seed inoculation trials. The model intercept includes uninoculated wheatgrass (seed type), June (month), and 28 °C (temperature) for ease of comparison across trial types. Coef indicates variable coefficients, Exp(Coef) indicates the exponential of the coefficient values, SE indicates the standard error, *Z* is the test statistic used, and *P* indicates the significant values. "I." indicates seeds (under "seed type") treated with the bacterial inoculum meant to increase root nodule formation.

Category	Variable	Coef	Exp(Coef)	SE	*Z*	*P*
Seed Type	I. Wheatgrass	-0.012	0.987	0.040	-0.320	0.749
	I. Radish	-0.022	0.978	0.040	-0.551	0.582
	Radish	-0.009	0.990	0.040	-0.228	0.820
Month	July	1.200	3.321	0.069	17.154	<0.001
	Aug	0.913	2.499	0.089	10.291	<0.001
Temp (°C)	29	0.099	1.104	0.075	1.313	0.189
	30	0.524	1.689	0.069	7.560	<0.001
	31	3.597	36.517	0.126	28.401	<0.001
	32	1.269	3.559	0.063	19.926	<0.001
	33	1.681	5.374	0.074	22.625	<0.001
	34	1.330	3.781	0.087	15.173	<0.001
	35	1.330	3.781	0.095	13.880	<0.001
	36	1.614	5.025	0.138	11.691	<0.001
	37	1.330	3.781	0.080	16.427	<0.001