

Supplementary Table S1. Number of ticks collected from raccoon

	<i>H. flava</i>			<i>I. tanuki</i>			<i>H. longicornis</i>			<i>I. ovatus</i>			<i>H. megaspinosa</i>		
	Adult	Nymph	Larva	Adult	Nymph	Larva	Adult	Nymph	Larva	Adult	Nymph	Larva	Adult	Nymph	Larva
Number of ticks collected	28108	13991	4287	283	19	7	113	134	33	232	24	0	122	42	7
Total			46386			309			280			256			171

	<i>A. testudinarium</i>			<i>H. hystricis</i>			<i>H. japonica</i>			<i>H. formosensis</i>			Unidentifiable		
	Adult	Nymph	Larva	Adult	Nymph	Larva	Adult	Nymph	Larva	Adult	Nymph	Larva	Adult	Nymph	Larva
Number of ticks collected	0	3	7	6	0	0	1	3	0	0	1	0	43	58	83
Total			10			6			4			1			184

Supplementary Table S2. Results of Steel Dwass test on adult ticks

Adult tick comparison	Estimator	Lower	Upper	Statistic	p.Value	
F-cervix , F-dorsum	0.525	-0.056	1.106	0.197	1.000	
F-cervix , F-ears	0.835	0.411	1.259	3.609	0.165	
F-cervix , F-face	0.715	0.164	1.266	1.785	0.911	
F-cervix , F-limbs	0.325	-0.16	0.81	-1.649916	0.948	
F-cervix , F-tail	0.25	-0.131	0.631	-3	0.343	
F-cervix , F-ventrum	0.4	-0.137	0.937	-0.8519428	1.000	
F-cervix , M-cervix	0.647	0.173	1.122	1.419	0.986	
F-cervix , M-dorsum	0.578	0.098	1.057	0.742	1.000	
F-cervix , M-ears	0.933	0.729	1.137	9.713	0.000	**
F-cervix , M-face	0.883	0.591	1.175	6.005	0.008	**
F-cervix , M-limbs	0.417	-0.071	0.905	-0.7808066	1.000	
F-cervix , M-tail	0.3	-0.123	0.723	-2.159517	0.751	
F-cervix , M-ventrum	0.5	-0.028	1.028	0.000	1.000	
F-dorsum , F-ears	0.77	0.256	1.284	2.402	0.625	
F-dorsum , F-face	0.67	0.072	1.268	1.299	0.994	
F-dorsum , F-limbs	0.315	-0.152	0.782	-1.809729	0.903	
F-dorsum , F-tail	0.25	-0.131	0.631	-3	0.344	
F-dorsum , F-ventrum	0.385	-0.145	0.915	-0.9916004	1.000	
F-dorsum , M-cervix	0.6	0.072	1.128	0.866	1.000	
F-dorsum , M-dorsum	0.539	0.027	1.051	0.347	1.000	
F-dorsum , M-ears	0.881	0.539	1.222	5.092	0.025	**
F-dorsum , M-face	0.806	0.322	1.29	2.887	0.391	
F-dorsum , M-limbs	0.408	-0.08	0.897	-0.858215	1.000	
F-dorsum , M-tail	0.297	-0.127	0.722	-2.183013	0.741	
F-dorsum , M-ventrum	0.472	-0.077	1.021	-0.2313012	1.000	
F-ears , F-face	0.295	-0.281	0.871	-1.626608	0.954	
F-ears , F-limbs	0.105	-0.241	0.451	-5.224271	0.022	*
F-ears , F-tail	0.05	-0.179	0.279	-9	0.000	*
F-ears , F-ventrum	0.125	-0.238	0.488	-4.722474	0.041	*
F-ears , M-cervix	0.303	-0.189	0.795	-1.831832	0.896	
F-ears , M-dorsum	0.289	-0.175	0.753	-2.078535	0.794	
F-ears , M-ears	0.694	0.227	1.162	1.901	0.871	
F-ears , M-face	0.583	0.031	1.135	0.690	1.000	
F-ears , M-limbs	0.119	-0.222	0.46	-5.102586	0.025	*
F-ears , M-tail	0.069	-0.19	0.329	-7.587945	0.001	*
F-ears , M-ventrum	0.15	-0.242	0.542	-4.086321	0.090	
F-face , F-limbs	0.135	-0.309	0.579	-3.754715	0.136	
F-face , F-tail	0.05	-0.179	0.279	-9	0.000	*
F-face , F-ventrum	0.195	-0.288	0.678	-2.886996	0.389	
F-face , M-cervix	0.497	-0.017	1.012	-0.02467977	1.000	
F-face , M-dorsum	0.4	-0.095	0.895	-0.9228251	1.000	
F-face , M-ears	0.861	0.539	1.183	5.132	0.024	**
F-face , M-face	0.783	0.373	1.193	3.160	0.288	
F-face , M-limbs	0.208	-0.192	0.608	-3.332985	0.233	
F-face , M-tail	0.089	-0.189	0.366	-6.77279	0.003	*
F-face , M-ventrum	0.264	-0.18	0.707	-2.434365	0.606	
F-limbs , F-tail	0.45	0.221	0.679	-1	1.000	
F-limbs , F-ventrum	0.585	0.152	1.018	0.898	1.000	
F-limbs , M-cervix	0.764	0.361	1.167	2.992	0.348	

F-limbs , M-dorsum	0.722	0.349	1.095	2.725	0.464	
F-limbs , M-ears	0.961	0.775	1.147	11.344	0.000	**
F-limbs , M-face	0.931	0.694	1.167	8.333	0.001	**
F-limbs , M-limbs	0.6	0.215	0.985	1.187	0.998	
F-limbs , M-tail	0.5	0.201	0.799	0.000	1.000	
F-limbs , M-ventrum	0.7	0.266	1.134	2.109	0.778	
F-tail , F-ventrum	0.65	0.301	0.999	1.964	0.845	
F-tail , M-cervix	0.833	0.572	1.095	5.831	0.011	**
F-tail , M-dorsum	0.778	0.502	1.053	4.610	0.046	**
F-tail , M-ears	0.999	0.998	1	2361.699	0.000	**
F-tail , M-face	0.972	0.845	1.099	17.000	0.000	**
F-tail , M-limbs	0.667	0.405	0.928	2.915	0.378	
F-tail , M-tail	0.556	0.381	0.73	1.458	0.982	
F-tail , M-ventrum	0.778	0.502	1.053	4.610	0.047	**
F-ventrum , M-cervix	0.714	0.278	1.15	2.244	0.708	
F-ventrum , M-dorsum	0.656	0.222	1.089	1.640	0.952	
F-ventrum , M-ears	0.956	0.785	1.126	12.205	0.000	**
F-ventrum , M-face	0.914	0.659	1.169	7.424	0.002	**
F-ventrum , M-limbs	0.519	0.071	0.968	0.198	1.000	
F-ventrum , M-tail	0.403	0.008	0.797	-1.127221	0.999	
F-ventrum , M-ventrum	0.606	0.109	1.102	0.972	1.000	
M-cervix , M-dorsum	0.461	0.017	0.906	-0.3965053	1.000	
M-cervix , M-ears	0.846	0.555	1.137	5.431	0.017	**
M-cervix , M-face	0.769	0.407	1.131	3.391	0.216	
M-cervix , M-limbs	0.272	-0.097	0.64	-2.833729	0.411	
M-cervix , M-tail	0.198	-0.102	0.497	-4.623089	0.047	*
M-cervix , M-ventrum	0.333	-0.082	0.749	-1.83375	0.895	
M-dorsum , M-ears	0.844	0.55	1.138	5.357	0.018	**
M-dorsum , M-face	0.767	0.389	1.145	3.227	0.264	
M-dorsum , M-limbs	0.355	-0.035	0.745	-1.699811	0.937	
M-dorsum , M-tail	0.262	-0.057	0.582	-3.398854	0.214	
M-dorsum , M-ventrum	0.42	-0.013	0.852	-0.8484514	1.000	
M-ears , M-face	0.356	-0.084	0.796	-1.491285	0.978	
M-ears , M-limbs	0.039	-0.083	0.16	-17.41019	0.000	*
M-ears , M-tail	0.009	-0.034	0.053	-51.50674	0.000	*
M-ears , M-ventrum	0.051	-0.094	0.196	-14.15777	0.000	*
M-face , M-limbs	0.082	-0.128	0.291	-9.12018	0.000	*
M-face , M-tail	0.04	-0.107	0.188	-14.2524	0.000	*
M-face , M-ventrum	0.1	-0.142	0.343	-7.53265	0.001	*
M-limbs , M-tail	0.381	0.067	0.695	-1.731733	0.929	
M-limbs , M-ventrum	0.591	0.184	0.998	1.022	1.000	
M-tail , M-ventrum	0.724	0.396	1.052	3.117	0.300	

M-: Male raccoon.

F-: Female raccoon.

*: The intensity of tick infestation in the former body region is significantly higher than that in the latter body region ($\alpha=0.05$).

**: The intensity of tick infestation in the latter body region is significantly higher than that in the former body region ($\alpha=0.05$).

Supplementary Table S2. (continued)

Nymphal tick comparison	Estimator	Lower	Upper	Statistic	p.Value	
F-cervix , F-dorsum	0.420	-0.129	0.969	-0.6676979	1.000	
F-cervix , F-ears	0.940	0.655	1.225	7.076	0.003	**
F-cervix , F-face	0.715	0.156	1.274	1.762	0.923	
F-cervix , F-limbs	0.325	-0.161	0.811	-1.649916	0.952	
F-cervix , F-tail	0.305	-0.149	0.759	-1.967012	0.850	
F-cervix , F-ventrum	0.510	-0.074	1.094	0.078	1.000	
F-cervix , M-cervix	0.567	0.032	1.102	0.570	1.000	
F-cervix , M-dorsum	0.489	-0.013	0.990	-0.101427	1.000	
F-cervix , M-ears	0.911	0.666	1.156	7.673	0.002	**
F-cervix , M-face	0.817	0.446	1.187	3.911	0.113	
F-cervix , M-limbs	0.417	-0.071	0.904	-0.7825756	1.000	
F-cervix , M-tail	0.294	-0.129	0.718	-2.223534	0.724	
F-cervix , M-ventrum	0.594	0.073	1.116	0.829	1.000	
F-dorsum , F-ears	0.940	0.655	1.225	7.076	0.003	**
F-dorsum , F-face	0.790	0.312	1.268	2.775	0.444	
F-dorsum , F-limbs	0.405	-0.018	0.828	-1.027402	1.000	
F-dorsum , F-tail	0.405	-0.018	0.828	-1.027402	1.000	
F-dorsum , F-ventrum	0.575	0.049	1.101	0.653	1.000	
F-dorsum , M-cervix	0.658	0.177	1.140	1.506	0.977	
F-dorsum , M-dorsum	0.583	0.128	1.038	0.839	1.000	
F-dorsum , M-ears	0.931	0.720	1.141	9.366	0.000	**
F-dorsum , M-face	0.844	0.497	1.192	4.542	0.052	
F-dorsum , M-limbs	0.514	0.062	0.966	0.141	1.000	
F-dorsum , M-tail	0.394	-0.007	0.796	-1.204329	0.998	
F-dorsum , M-ventrum	0.667	0.189	1.144	1.597	0.963	
F-ears , F-face	0.155	-0.336	0.646	-3.217919	0.271	
F-ears , F-limbs	0.060	-0.225	0.345	-7.075943	0.003	*
F-ears , F-tail	0.001	0.000	0.002	-2361.699	0.000	*
F-ears , F-ventrum	0.150	-0.33	0.630	-3.337119	0.233	
F-ears , M-cervix	0.014	-0.058	0.086	-30.82906	0.000	*
F-ears , M-dorsum	0.042	-0.152	0.235	-10.8276	0.000	*
F-ears , M-ears	0.642	0.133	1.150	1.275	0.996	
F-ears , M-face	0.381	-0.12	0.881	-1.093059	0.999	
F-ears , M-limbs	0.001	0.000	0.002	-2361.699	0.000	*
F-ears , M-tail	0.001	0.000	0.002	-2361.699	0.000	*
F-ears , M-ventrum	0.039	-0.124	0.201	-12.98625	0.000	*
F-face , F-limbs	0.170	-0.266	0.606	-3.463572	0.200	
F-face , F-tail	0.150	-0.238	0.538	-4.134371	0.086	
F-face , F-ventrum	0.325	-0.249	0.899	-1.396899	0.989	
F-face , M-cervix	0.367	-0.151	0.885	-1.178606	0.998	
F-face , M-dorsum	0.306	-0.168	0.779	-1.879376	0.883	
F-face , M-ears	0.775	0.333	1.217	2.847	0.409	
F-face , M-face	0.678	0.150	1.206	1.541	0.972	
F-face , M-limbs	0.222	-0.208	0.652	-2.958693	0.365	
F-face , M-tail	0.117	-0.223	0.457	-5.163528	0.023	*
F-face , M-ventrum	0.336	-0.18	0.852	-1.453909	0.984	
F-limbs , F-tail	0.495	0.170	0.820	-0.07035975	1.000	
F-limbs , F-ventrum	0.640	0.189	1.091	1.421	0.987	

F-limbs , M-cervix	0.725	0.283	1.167	2.331	0.668	
F-limbs , M-dorsum	0.656	0.257	1.054	1.787	0.915	
F-limbs , M-ears	0.947	0.765	1.129	11.250	0.000	**
F-limbs , M-face	0.867	0.554	1.179	5.373	0.018	**
F-limbs , M-limbs	0.600	0.214	0.986	1.187	0.998	
F-limbs , M-tail	0.500	0.201	0.799	0.000	1.000	
F-limbs , M-ventrum	0.725	0.283	1.167	2.331	0.670	
F-tail , F-ventrum	0.650	0.209	1.091	1.557	0.970	
F-tail , M-cervix	0.747	0.370	1.124	3.003	0.344	
F-tail , M-dorsum	0.667	0.295	1.039	2.052	0.810	
F-tail , M-ears	0.953	0.786	1.120	12.399	0.000	**
F-tail , M-face	0.900	0.662	1.138	7.704	0.001	**
F-tail , M-limbs	0.611	0.252	0.971	1.415	0.988	
F-tail , M-tail	0.500	0.201	0.799	0.000	1.000	
F-tail , M-ventrum	0.739	0.339	1.139	2.736	0.461	
F-ventrum , M-cervix	0.558	0.006	1.111	0.484	1.000	
F-ventrum , M-dorsum	0.492	-0.021	1.005	-0.07439197	1.000	
F-ventrum , M-ears	0.872	0.564	1.181	5.526	0.014	**
F-ventrum , M-face	0.764	0.298	1.230	2.594	0.533	
F-ventrum , M-limbs	0.436	-0.056	0.929	-0.5938186	1.000	
F-ventrum , M-tail	0.333	-0.095	0.762	-1.781403	0.916	
F-ventrum , M-ventrum	0.547	-0.013	1.108	0.386	1.000	
M-cervix , M-dorsum	0.414	-0.009	0.836	-0.9369843	1.000	
M-cervix , M-ears	0.881	0.606	1.156	6.349	0.006	**
M-cervix , M-face	0.809	0.456	1.161	4.006	0.101	
M-cervix , M-limbs	0.347	-0.047	0.741	-1.775903	0.918	
M-cervix , M-tail	0.225	-0.084	0.534	-4.071016	0.093	
M-cervix , M-ventrum	0.485	0.039	0.930	-0.1586373	1.000	
M-dorsum , M-ears	0.900	0.661	1.139	7.657	0.001	**
M-dorsum , M-face	0.827	0.500	1.154	4.577	0.049	**
M-dorsum , M-limbs	0.432	0.039	0.825	-0.7903833	1.000	
M-dorsum , M-tail	0.315	-0.006	0.636	-2.639548	0.510	
M-dorsum , M-ventrum	0.562	0.130	0.994	0.654	1.000	
M-ears , M-face	0.279	-0.13	0.688	-2.470664	0.597	
M-ears , M-limbs	0.073	-0.128	0.273	-9.748375	0.000	*
M-ears , M-tail	0.034	-0.109	0.176	-14.97283	0.000	*
M-ears , M-ventrum	0.114	-0.16	0.388	-6.443863	0.005	*
M-face , M-limbs	0.130	-0.154	0.413	-5.978498	0.009	*
M-face , M-tail	0.093	-0.139	0.324	-8.049062	0.001	*
M-face , M-ventrum	0.191	-0.163	0.546	-3.9895	0.105	
M-limbs , M-tail	0.377	0.064	0.689	-1.808101	0.908	
M-limbs , M-ventrum	0.648	0.246	1.050	1.687	0.944	
M-tail , M-ventrum	0.781	0.473	1.089	4.172	0.082	

M-: Male raccoon.

F-: Female raccoon.

*: The intensity of tick infestation in the former body region is significantly higher than that in the latter body region ($\alpha=0.05$).

** : The intensity of tick infestation in the latter body region is significantly higher than that in the former body region ($\alpha=0.05$).