

Native terrestrial invertebrate fauna from the northern Antarctic Peninsula: new records, state of current knowledge and ecological preferences – Summary of a German federal study

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Supplementary Material

Table S1. Average values of the substrate parameters of the investigated sites measured in the individual study years. For a statistical analysis and further information, see Russell et al. (2013). Vegetation cover is given as an average of all plots of the categories: 1 = cover up to 25%, 2 = 25–50%, 3 = 50–<100%, 4 = 100%. For the specific plant societies, see Russell et al. (2013). ‘Organic Material (%)’ represents the mass loss at ignition (500°C for 2 hours).

Site	Jahr	Vegetation cover				Organic Material				Substrate Texture						
		Vegetation cover	Soil Temperature (°C)	Soil Moisture (%)	pH	Organic Material (%)	N _{tot} (%)	C _{org} (%)	C/N	Coarse Gravel (%)	Medium Gravel (%)	Fine Gravel (%)	Coarse Sand (%)	Medium Sand (%)	Fine Sand (%)	Clay/Silt (%)
Arctowski Station	2010	2.9	5.50	38.53	5.0	12.07	0.59	6.16	10.43	11.82	23.27	13.12	15.27	26.92	5.59	4.00
Biologenbucht	2010	3.4	4.20	30.68	5.4	8.38	0.23	2.32	10.98	0	9.95	9.72	16.79	27.59	24.64	11.31
Punta Cristian	2010	2.8	3.80	20.76	4.4	8.26	0.27	2.49	9.21	0	13.12	18.71	23.45	19.45	16.19	9.08
Punta Cristian II	2010	2.9	4.67	14.90	4.6		0.11	1.12	10.18	0	8.13	28.01	50.03	10.32	2.02	1.49
Ardley Island	2011	3.9	9.80	46.18		insufficient soil substrate available for measurement										
Halfmoon Island	2010	1.9	3.55	21.49	3.8	9.71	0.70	4.68	6.65	24.27	29.61	12.42	11.29	8.72	7.34	6.36
Halfmoon Island	2011	1.5	2.00	11.36	3.3	6.73	0.55	3.30	6.00	13.18	20.24	27.80	16.97	10.70	6.48	4.63
Hannah Point	2011	3.1	3.93	18.11	2.9	4.15	0.30	1.51	4.96	0.00	13.28	6.61	12.78	42.19	21.93	3.21
Whalers Bay	2010	0.9	10.64	14.00	4.6	0.87	0.05	0.34	8.17	0.64	11.98	22.63	21.02	21.11	13.84	8.77
Whalers Bay	2011	0.3	7.88	14.60	4.9	0.50	0.04	0.13	3.81	0.31	11.44	19.40	25.40	21.62	16.46	5.37
Telefon Bay	2011	0	8.97	14.38	6.3	0.39	0.14	0.11	3.26	0.78	8.17	25.18	22.97	12.86	17.09	12.94
Neko Harbour	2010	0	6.98	14.04	6.1	3.27	0.26	1.43	5.10	7.06	19.13	14.07	30.93	17.83	5.26	5.73
Neko Harbour	2011	0	9.12	8.04	7.1	3.74	0.42	2.17	4.14	7.98	10.77	42.59	13.70	23.01	1.22	0.74
Petermann Island	2010	0	5.29	11.62	6.1	1.87	0.14	0.78	5.69	2.44	33.32	22.49	13.09	27.07	1.24	0.36
Devil Island	2010	0	8.77	17.57	5.9	4.19	0.22	0.73	5.18	0.99	11.29	14.82	18.28	42.18	8.30	4.14
Paulet Island	2011	1.3	2.10	18.53	5.6	19.67	1.53	7.85	4.92	25.44	46.17	6.45	8.36	6.13	4.70	2.75

Tables S2-S6. Spearman rank correlations between general community parameters as well as densities of the identified soil-animal species and abiotic habitat factors as well as the vegetation cover of the various study sites. Only highly significant correlation coefficients ($P < 0.001$) are shown; negative correlations in red. Sampling date and latitude represent proxies for “locality”. Zoological data used for the analyses: densities in individuals per 100 cm³ substrate and species richness in number of species per sample.

Table S2. Collembola.

	Sampling Date	Latitude	Vegetation Cover	Soil Temperature (°C)	Soil Moisture (%)	Soil-pH	Organic Matter (%)	N _{tot} (%)	C _{org} (%)	C/N-Ratio	Coarse Gravel	Medium Gravel	Fine Gravel	Coarse Sand	Medium Sand	Fine Sand	Silt/Clay
2010																	
Total Densities	0.416	0.554	0.556	0.260	0.260	0.280	0.335	0.480	0.472	-0.266							
Species Richness	0.353	0.616	0.521	0.341	0.341												
<i>Archisotoma brucei</i>	-0.282														0.279		-0.257
<i>Cryptopygus antarcticus</i>		0.553		0.457	0.457	0.288	0.421	0.542	0.261						0.307		
<i>Cryptopygus badasa</i>	0.641	0.512	0.606	-0.405													
<i>Folsomotoma octooculata</i>	0.314	0.304	0.432	-0.359		0.260									-0.287		
<i>Friesea grisea</i>		0.547	0.399	0.420	0.420	0.452	0.273	0.361	0.416				-0.272				
<i>Friesea woyciechowskii</i>	0.284																
<i>Hypogastrura viatica</i>	-0.520	-0.349	-0.360	0.532		-0.510	-0.410	-0.317	-0.481	-0.317							
<i>Mucrosomia caecus</i>				0.288		-0.275	-0.285	-0.287									
<i>Tullbergia mixta</i>	0.378	0.432	0.515	-0.297		0.301		0.438									
2011																	
Total Densities	0.289	0.439	0.499	-0.296	0.499	-0.287											
Species Richness	0.326	0.479	0.479	-0.352	0.479	-0.288										0.293	
<i>Cryptopygus antarcticus</i>		0.343	0.395	-0.318	0.324	0.280									-0.315	0.304	
<i>Cryptopygus badasa</i>		0.398	0.408	0.309	0.365												
<i>Folsomotoma octooculata</i>		0.439	0.438	0.363	0.426												
<i>Friesea grisea</i>		0.302	0.400	0.339	-0.373									-0.298	0.362	0.337	
<i>Hypogastrura viatica</i>	-0.397																
<i>Tullbergia mixta</i>		0.397	0.389	0.317	0.410												

Table S3. Actinedida (Acari).

	Sampling Date	Latitude	Vegetation Cover	Soil Temperature (°C)	Soil Moisture (%)	Soil-pH	Organic Matter (%)	N _{tot} (%)	C _{org} (%)	C/N-Ratio	Coarse Gravel	Medium Gravel	Fine Gravel	Coarse Sand	Medium Sand	Fine Sand	Silt/Clay
2010																	
Total Densities	0.594	0.627	0.622	-0.358	0.310		0.521		0.355	0.596							
Species Richness	0.603	0.568	0.596	-0.320	0.283	-0.274	0.503		0.325	0.531							
<i>Apotriphydeus scotia</i>				-0.287													
<i>Bakerdania antarcticus</i>		0.317			0.282												
<i>Ereynetes macquariensis</i>	0.440	0.341	0.311				0.318			0.322					-0.259	-0.276	
<i>Eupodes exiguus</i>	0.416	0.455	0.338	-0.288			0.471		0.327	0.437							
<i>Nanorchesites berryi</i>	0.556	0.449	0.523	-0.386			0.510			0.545							
<i>Stereotydeus villosus</i>	0.318																
Tarsonemidae			0.272														
2011																	
Total Densities		0.262	0.310	0.396	0.300			-0.291	-0.331								
Species Richness			0.259	0.364	0.256			-0.281	-0.317								
<i>Coccydaeoilus krantzii</i>								-0.307	-0.333								
<i>Ereynetes macquariensis</i>		0.311	0.306		0.323												
<i>Nanorchesites berryi</i>		0.455	0.441	0.400	0.405												

Table S4. Oribatida (Acari).

	Sampling Date	Latitude	Vegetation Cover	Soil Temperature (°C)	Soil Moisture (%)	Soil-pH	Organic Matter (%)	N _{tot} (%)	C _{org} (%)	C/N-Ratio	Coarse Gravel	Medium Gravel	Fine Gravel	Coarse Sand	Medium Sand	Fine Sand	Silt/Clay
2010																	
Total Densities				0.316	0.366	0.357	0.367										
Species Richness			0.256	0.327	0.333	0.323	0.346										
<i>Alaskozetes antarcticus</i>				0.263													
<i>A. antarcticus</i> + nymphs				0.330	0.32	0.326	0.341										-0.269
2011																	
Total Densities	0.397	0.448	-0.515	0.477	0.432	0.466	0.421										
Species Richness	0.404	0.453	-0.510	0.472	0.423	0.459	0.420										
<i>Alaskozetes antarcticus</i>							0.328										
<i>A. antarcticus</i> + nymphs	0.408	0.299	0.463	-0.542	0.482	0.448	0.477	0.428									

Table S5. Gamasina (Acari).

	Sampling Date	Latitude	Vegetation Cover	Soil Temperature (°C)	Soil Moisture (%)	Soil-pH	Organic Matter (%)	N _{tot} (%)	C _{org} (%)	C/N-Ratio	Coarse Gravel	Medium Gravel	Fine Gravel	Coarse Sand	Medium Sand	Fine Sand	Silt/Clay
2010																	
Total Densities	0.446	0.422	0.466	0.388	0.262	0.276											
Species Richness	0.438	0.401	0.457	0.408	0.266												
<i>Hydrogamasellus racovitzai</i>	0.414	0.382	0.450	0.371													
2011																	
Total Densities		0.304	0.363	0.317													
Species Richness		0.306	0.362	0.314													
<i>Hydrogamasellus racovitzai</i>		0.357	0.402	0.310													

Table S6. Nematoda.

2010	Sampling Date	Latitude	Vegetation Cover	Soil Temperature (°C)	Soil Moisture (%)	Soil-pH	Organic Matter (%)	N _{tot} (%)	C _{org} (%)	C/N-Ratio	Coarse Gravel	Medium Gravel	Fine Gravel	Coarse Sand	Medium Sand	Fine Sand	Silt/Clay
Total Densities	0.380	0.794	0.679	0.588	0.588	0.566	0.431	0.592	0.431	0.592	0.292	-0.276	-0.266	0.471	0.532	0.309	0.344
Species Richness	0.502	0.759	0.708	-0.554	0.430	-0.273	0.577	0.382	0.592	0.592	0.292	-0.276	-0.266	0.471	0.532	0.309	0.344
<i>Acroboloides arctowskii</i>		0.271					0.296				0.292			0.285	0.285	0.270	
<i>Aphelenchoides haguei</i>		0.395	0.392	-0.294													
<i>Aphelenchoides helicospoma</i>				-0.359													
<i>Ceratoplectus armatus</i>		0.353	0.398	0.330	0.330	-0.286	0.336	0.344	0.357	0.279	0.288	-0.352	-0.352	0.289	0.532	0.373	0.373
<i>Coomansus gerlachei</i>				-0.351			0.340				0.288			-0.263			
<i>Ditylenchus parevivens</i>		0.299	0.280	-0.338													
<i>Eudorylaimus coniceps</i>	0.327		0.427	-0.390			0.307	0.305	0.305	0.305	0.352					0.491	0.349
<i>Eudorylaimus paradoxus</i>		0.367	0.403	-0.400			0.289	0.373	0.373	0.373	-0.297	-0.298				0.326	
<i>Eudorylaimus pseudocarleri</i>		0.329	0.290	-0.312			0.315										
<i>Eumonyhystera</i> sp.		0.511	0.460	-0.335	0.411		0.423	0.330	0.330	0.327				0.458	0.458	0.327	
<i>Eumonyhystera vulgaris</i>	0.575	0.546	0.541	0.351	0.351		0.410	0.473	0.473	0.473							
<i>Filenchus</i> sp. 1		0.421	0.415	-0.525	0.303		0.417	0.276	0.336	0.336	-0.316			0.640	0.640	0.529	
<i>Filenchus</i> sp. 2				-0.347													
<i>Geomonhystera villosa</i>	0.438		0.428								-0.268	-0.360		0.360			
<i>Mesodorylaimus antarcticus</i>		0.359															
<i>Mesodorylaimus chipevi</i>		0.297			0.272		0.262	0.288	0.262	0.288							
<i>Mesodorylaimus</i> sp.				-0.452													
<i>Panagrolaimus</i> sp.	-0.313			0.455													
<i>Pelodera parateres</i> -group		0.360	0.259	0.332	0.332												
<i>Pelodera strongyloides</i> -group						0.289											
<i>Plectus antarcticus</i>																0.310	0.265
<i>Plectus</i> sp.		0.323	0.345	-0.278	0.280		0.264	0.264	0.264	0.264				0.481	0.481	0.314	0.314
<i>Plectus</i> cf. <i>belgicae</i>	0.448	0.276	0.453	-0.301			0.276	0.276	0.276	0.276			0.293	0.286			
<i>Plectus</i> cf. <i>tolerans</i>	0.524		0.308	-0.261									0.394	0.460	-0.380		
<i>Prismatolaimus</i> sp.		0.297		-0.390			0.306	0.295	0.295	0.295				0.266	0.266		
<i>Teratocephalus tilbrookii</i>	0.403	0.431	0.526	-0.547	0.332		0.529	0.306	0.488	0.488	-0.319	-0.357		0.338	0.338	0.258	0.258

Table S6. Nematoda.

2011	Sampling Date	Latitude	Vegetation Cover	Soil Temperature (°C)	Soil Moisture (%)	Soil-pH	Organic Matter (%)	N _{tot} (%)	C _{org} (%)	C/N-Ratio	Coarse Gravel	Medium Gravel	Fine Gravel	Coarse Sand	Medium Sand	Fine Sand	Silt/Clay
Total Densities		0.413	0.617		0.538	-0.354	0.461	0.450	0.484		0.392			-0.362			
Species Richness		0.559	0.677		0.656	-0.416	0.317	0.300	0.300					-0.410	0.403	0.282	
<i>Acrobeloides arctowskii</i>	-0.263														0.276		
<i>Aphelenchoides haguei</i>	-0.109														0.284		
<i>Aporcelaimellus</i> sp. juv.		0.474	0.478	0.370	0.426												
<i>Coomansus getlachei</i>	0.370	0.420	0.392	-0.609		-0.687	0.433	0.384	0.416	0.481							
<i>Eudorylaimus pseudocarteri</i>		0.400	0.407	0.305	0.312												
<i>Geomonhystera villosa</i>		0.444	0.493	0.324	0.394											0.304	
<i>Panagrolaimus</i> sp.																	
<i>Pelodera strongyloides</i> -group															0.327		
<i>Pelodera teres</i> -group		-0.258					0.417	0.342	0.350		0.407			-0.380			
<i>Plectus</i> cf. <i>belgicae</i>		0.472	0.499	0.295	0.458												
<i>Plectus insolens</i>		0.439	0.447	0.363	0.424												
<i>Plectus</i> sp. 1																	
<i>Plectus</i> cf. <i>tolerans</i>		0.412	0.507		0.385	-0.291									0.298		
<i>Rhabditis marina</i> -group	-0.366		-0.257				-0.300								-0.339		
<i>Teratocephalus rugosus</i>											0.311						
<i>Teratocephalus tilbrooki</i>		0.579	0.603	0.411	0.541												

Tables S7–S9. In the main manuscript, the known distributions of the determined species are given in Tables 2–4. The information for these distributions was primarily derived from data obtained from the Biodiversity Database of the Australian Antarctic Data Centre (SCAR Life Sciences programme EBA [Evolution and Biodiversity in the Antarctic]). In the following tables, data for the sites listed below were further augmented by information obtained from the Antarctic soil faunal literature (as far as available to the authors) given below. The localities are sorted by increasing southern latitude.

Table S7: Collembola.

Coronation Isl.	Wise (1967)
Larsen Isl.	Wise (1971)
Lynch Isl.	Usher & Edwards (1984, 1986)
Geddes Isl.	Wise (1971)
Signy Isl.	Block & Convey (2001), Booth & Usher (1984), Broady (1979), Burn (1984), Burn & Lister (1988), Cannon (1986), Hayward et al. (2001), Schenker (1984), Wise (1967, 1971)
Laurie Isl.	Carpenter (1907), Wise (1971)
Penguin Isl.	Wise (1971)
King George Isl., Mackellar Inlet	Wise (1971)
King George Isl., Keller Peninsula	Greenslade (1995), Weiner (1980)
King George Isl., Admiralty Bay	Gressitt et al. (1963), Wise (1971)
Arctowski and Bellingshausen (KGL)	Schaller & Kopeszki (1991)
King George Isl., Fildes Peninsula	Bulavintsev (1990), Ohyama & Shimada (1998), Yue & Tamura (2001)
King George Isl., Potter Cove	Wise (1971)
Ardley Isl	Bulavintsev (1990), Usher & Edwards (1986)
Nelson Isl.	Wahlgren (1906)
King George Isl. (not specified)	Gressitt et al. (1963)
Torre Isl.	Gressitt et al. (1963)
Islet near Torre Isl.	Gressitt et al. (1963)
Gonzales Isl.	Gressitt et al. (1963)
Greenwich Isl. (not specified)	Gressitt et al. (1963), Wise (1971)
Isla de la Fuente	Gressitt et al. (1963)
Greenwich Isl., Base Arturo Prat	Gressitt et al. (1963)
Greenwich Isl., Yankee Hbr.	Wise (1971)
Juan Carlos Station (Livingstone Isl.)	Schaller & Kopeszki (1991)
Livingston Isl., Byers Peninsula	Convey et al. (1996), Greenslade (1995), Richard et al. (1994), Usher & Edwards (1984)
Livingston Isl., False Bay	Wise (1967, 1971)
Deception Isl. (not specified)	Downey et al. (2000), Greenslade (2010), Gressitt et al. (1963), Salmon (1962), Tilbrook (1967)
Deception Isl., Whalers Bay	Greenslade et al. (2012)
Esperanza station	Schaller & Kopeszki (1991)
Hope Bay (N. Antarctic Peninsula)	Wise (1971)
Tabarin (N. Antarctic Peninsula)	Wise (1971)
Tower Isl.	Wise (1971)
Paulet Isl.	Wahlgren (1906)
Auguste Isl.	Gressitt & Weber (1959)
Harry Isl.	Gressitt & Weber (1959)
Alcock Isl.	Wise (1967, 1971)
Brabant Isl.	Greenslade (1995)
Danco coast, Brialmont Cove	Wise (1967)
Cuverville Isl.	Wise (1967, 1971)

Dream Isl.	Wise (1971)
Anvers Isl., Norsel Point	Wise (1971)
Humble Isl.	Benoit et al. (2009)
Janus & Humble Isls	Wise (1971)
Anvers Isl., Palmer station	Day et al. (2009), Schaller & Kopeszki (1991), Wise (1971)
Litchfield Isl.	Wise (1971)
Laggard Isl.	Wise (1971)
Anvers Isl., Biscoe Point	Wise (1971)
Anvers Isl., Port Lockroy	Wise (1971)
Graham Land, Paradise Harbour	Wise (1967)
Hovgaard Isl.	Wise (1971)
Uruguay Isl.	Wise (1971)
Galindez Isl.	Wise (1967)
Green Isl.	Usher & Edwards (1986)
Darboux Isl.	Usher & Edwards (1986)
Graham Land (not specified)	Gressitt & Weber (1959), Wahlgren (1906)
Adelaide Isl. (not specified)	Wise (1971)
Adelaide Isl., Rothera Point	Block & Worland (2001), Convey & Smith (1997), Greenslade (1995), Hawes et al. (2008), Hayward et al. (2004), Purac et al. (2008), Worland & Convey (2001)
Lagoon Isl.	Convey & Smith (1997), Greenslade (1995)
Leonie Isl.	Convey & Smith (1997), Greenslade (1995)
Anchorage Isl. (Marguerite Bay)	Bokhorst et al. (2007), Convey & Smith (1997)
Avian Isl. (near Anvers Isl.)	Wise (1971)
Dion Isl. (S of Adelaide Isl.)	Usher & Edwards (1986)
Faure Isl. (S of Adelaide Isl.)	Usher & Edwards (1986)
Ablation Valley (Alexander Isl.)	Convey & Smith (1997), Greenslade (1995)
Fossil Bluff (Alexander Isl.)	Convey & Smith (1997)
Ares Oasis (Alexander Isl.)	Convey & Smith (1997)
Mars Oasis (Alexander Isl.)	Convey & Smith (1997)
Two Step Moraine (Alexander Isl.)	Convey & Smith (1997)

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Table S8. Acari.

South Orkney Islands (unspecified)	Block & Convey (1995), Cekalovic (1976), Pugh (1993), Strandtmann (1967), Tilbrook (1967a), Wallwork (1967, 1973)
South Shetland Islands (unspecified)	Block & Convey (1995), Cekalovic (1976), Dalenius (1965), Dalenius & Wilson (1958), Gressitt (1971), Hogg & Stevens (2002), Pugh (1993), Wallwork (1973)
King George Island (unspecified)	Gressitt et al. (1963), Strandtmann (1967)
Palmer Land (unspecified)	Pugh (1993)
Graham Land (unspecified)	Pugh (1993), Dalenius (1965), Strandtmann (1967), Wallwork (1967)
South Sandwich Islands	Convey et al. (2000a), Pugh (1993), Strandtmann (1967), Tilbrook (1967a), Tilbrook (1967b), Wallwork (1967, 1973)
Lynch Island	Usher & Edwards (1984)
Monroe Island	Gressitt (1967), Strandtmann (1967)
Frederiksen Island	Block & Starý (1996)
Signy Island	Block (1980), Block & Convey (1995), Booth (1984), Booth & Usher (1986), Booth et al. (1985), Burn & Lister (1988), Goddard (1977), Goddard (1979a), Goddard (1979b), Goddard (1982), Gressitt (1971), Hunter (1967), Lister et al. (1988), Pugh & Dartnall (1994), Strandtmann (1967), Strandtmann & Tilbrook (1968), Tilbrook (1967a), Tilbrook (1967b), Usher & Booth (1984), Usher & Booth (1986), Wallwork (1967)
Laurie Island	Gressitt (1967), Strandtmann (1967)
Steepholm (Atriceps Island)	Block & Starý (1996)
Elephant Island	Gressitt (1967)
Gibbs Island (= Narrow Island)	Gressitt (1967)
K. George Isl., Admiralty Bay	Gryziak (2009), Womersley & Strandtmann (1963), Wallwork (1967)
Penguin Island	Gressitt (1967), Gressitt et al. (1963), Womersley & Strandtmann (1963), Wallwork (1967)
Ardley Island	Edwards & Usher (1987)
Nelson Island	Wallwork (1967)
Greenwich Island	Cekalovic (1976), Gressitt et al. (1963), Gressitt (1971), Strandtmann (1967), Wallwork (1967), Womersley & Strandtmann (1963)
Livingston Island	Cekalovic (1976), Convey et al. (1996), Edwards & Usher (1987), Gressitt et al. (1963), Richard et al. (1994), Strandtmann (1967), Wallwork (1967), Womersley & Strandtmann (1963)
Deception Island	Cekalovic (1976), Edwards & Usher (1987), Gressitt (1967), Gressitt (1971), Gressitt et al. (1963), Hunter (1967), Strandtmann (1967), Tilbrook (1967a), Tilbrook (1967b), Wallwork (1967), Womersley & Strandtmann (1963)
Astrolabe Island	Edwards & Usher (1987), Womersley & Strandtmann (1963)
Tower Island	Gressitt (1967), Strandtmann (1967)
James Ross Island	Wallwork (1967)
Vega Island	Block & Starý (1996)
Brabant Island	Block & Starý (1996)
Cierva Point (Danco Coast)	Convey & Quintana (1997)
Cockburn Island	Block & Starý (1996)
Spring Point (Brialmont Cove)	Wallwork (1967)
Slippery Rock Island	Gressitt (1967)
Boxing Island (Charlotte Bay)	Edwards & Usher (1987)
Cuverville Island	Edwards & Usher (1987)
Danco Island	Cekalovic (1976), Strandtmann (1967), Tilbrook (1967b)
Cormorant Island	Gressitt (1967)
Anvers Island	Block & Convey (1995), Cekalovic (1976), Crooker (1977), Gressitt (1967), Strandtmann (1967), Strong (1967), Wallwork (1967)
Humble/Torgersen Islands	Gressitt (1967)

Norsel Point (Amsler Island)	Gressitt (1967)
G. Videla Base, Paradise Bay	Gressitt et al. (1963), Womersley & Strandtmann (1963), Wallwork (1967)
Port Lockroy (Anvers Island)	Wallwork (1967), Strandtmann (1967)
Petermann Island	Cekalovic (1976), Dalenius (1965)
Argentine Islands	Block & Convey (1995), Tilbrook (1967a), Tilbrook (1967b), Wallwork (1967)
Galindez/Darboux Island	Edwards & Usher (1987)
Takaki Promontary	Booth et al. (1985)
Oxford Cliff	Edwards & Usher (1987)
Lagoon/Anchorage Island	Block & Starý (1996), Convey & Smith (1997)
Adelaide Island, Rothera Point	Block & Convey (1995), Block & Starý (1996), Convey & Smith (1997), Dalenius & Wilson (1958), Wallwork (1967)
northern Marguerite Bay	Convey & Smith (1997)
Leonie Island	Block & Starý (1996), Convey & Smith (1997)
Jenny Island	Edwards & Usher (1987)
Avian Island	Gressitt (1967), Wallwork (1967)
Horseshoe Island	Block & Starý (1996)
Camp Point (Square Bay)	Edwards & Usher (1987)
Red Rock Ridge	Edwards & Usher (1987)
Refuge Island	Edwards & Usher (1987)
Charcot Island	Convey et al. (2000b)
Alexander Island	Block & Starý (1996), Convey & Smith (1997)

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Table S9. Nematoda. Due to the paucity of nematode studies in the Antarctic Peninsula and the fact that many of the available records are found in the taxonomic literature, the sources of records are given here species-specific for Nematoda. Localities of the present investigation are shaded grey.

	<i>Acrobeloides arctowskii</i>	<i>Aphelenchoides haguei</i>	<i>Aphelenchoides helicosoma</i>	<i>Coomansus gertachei</i>	<i>Ditylenchus parcevivens</i>	<i>Enchodelus signyensis</i>	<i>Eudorylaimus coniceps</i>	<i>Eudorylaimus paradoxus</i>	<i>Eudorylaimus pseudocarteri</i>	<i>Mesodorylaimus antarcticus</i>	<i>Mesodorylaimus chipevi</i>	<i>Plectus antarcticus</i>	<i>Plectus belgicae</i>	<i>Plectus insolens</i>	<i>Plectus tolerans</i>	<i>Teratocephalus tilbrooki</i>	<i>Teratocephalus rugosus</i>
Coronation Island				1	2	2	2	2				e					
Signy Island		3	3	1,e	5	2,5	2,5	2	2,5			1,5	5,e	5		3,5	3
Elephant Island		e		1,e		2	2	2	2			5	5,e				
King George Island	8,p	p	p	p	p	p	p	p	p	p	p	p	p	p	p	p	p
Halfmoon Island				p			p									p	p
Livingston Island		p		4,p					p	6	6		p		p		p
Deception Island	p	p		1,5								5,p,e	p				p
Paulet Island																	
Devil Island												p					p
Intercurrence Island				1,4				2				e					
Danco Land coast + Brabant Island				5								5	5				
Neko Harbour										p							
Petermann Island													p				
Galindez/Darboux Island				1,e	2		2					e					
Bunger Hills												e					
Adelaide Island		9,e	9,e					9	9			9	9			9,e	
Lagoon/Anchorage Island		9,e		9,e				9				9,e	9		9		
Blaikrock Island						2						e					
Killingbeck Island												9					
Leonie Island		9,e		9,e				9				9,e			9	9,e	
Limpet Island				1				2				e					
Pourquoi pas Island												e					
Cone Island												e					
Avian Island				1,e								e					
Guebriant Islands				1			e					e					
Emperor Island							2					e			5		
Alamode Island		9,e				2,9						9					
Charcot Island				7	7,e	7,e		e				7,e			e	9,e	
Alexander Island		9,e			9,e	9,e		9,e				9,e	9		9,e		

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- e: EBA database
- p: present investigation