

SHORT COMMUNICATION

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Helminth fauna of snakes (Reptilia, Serpentes) in Belorussian Polesye

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Helminthological examination (dissection and organ compressing) of 93 specimens of three snake species [(*Natrix natrix* Linnaeus 1758 ($n = 52$), *Coronella austriaca* Laurenti 1768 ($n = 10$), *Vipera berus* Linnaeus 1758 ($n = 31$)] were carried out in Belorussian Polesye (the southern part of Belarus: Brest and Gomel regions) between 1980 and August 1999 (other Belorussian helminthologists did not investigate the helminth fauna of snakes during this period).

The total infection of snakes by helminths was 88.2%. All *N. natrix*, five *C. austriaca* and 25 *V. berus* were infected by helminths. The results of the helminthological examinations are illustrated in Table 1. The snakes were host to 22 species of helminth. *N. natrix* hosted all of the species of helminth, *C. austriaca* hosted

4 species and *V. berus* hosted 13 species. Larval stages of 8 species of helminth were found in the examined snakes. *Alaria alata* was the larval form registered most frequently. *A. alata* mesocercariae as well as larvae of both *Ascarops strongylina* and *Physocephalus sexalatus* were found in the three snake species. High numbers of the larvae of *Alaria alata*, *Strigea sphaerula* and *S. strigis* were found in snakes, varying from 20 to 1000 specimens per snake.

Spirometra erinacei, *A. alata*, *Ascarops strongylina* and *Ph. sexalatus* are very important for medicinal and veterinary science. These species of helminth are known as parasites of man, dog, cat (*Alaria alata*, *S. erinacei*) and pig (all species of these helminths).

Table 1 Helminth infections of snakes in Belorussian Polesye

Species of helminth	Host	Number of:	
		Infected hosts	Helminths (min–max)
<i>Acanthocephalus ranae</i> (Schrank 1788)	<i>Natrix natrix</i>	4	1–3
<i>Alaria alata</i> (Goeze 1782), larvae	<i>N. natrix</i>	11	More than 500
	<i>Coronella austriaca</i>	2	More than 500
	<i>Vipera berus</i>	7	20–more than 500
<i>Ascarops strongylina</i> (Rudolphi 1819), larvae	<i>N. natrix</i>	1	30
	<i>C. austriaca</i>	1	10
	<i>V. berus</i>	2	12–36
<i>Astiotrema monticelli</i> (Stossich 1904)	<i>N. natrix</i>	2	10–15
<i>Diplodiscus subclavatus</i> (Pallas 1760)	<i>N. natrix</i>	3	1–3
	<i>V. berus</i>	2	1–2
<i>Encyclometra colubrimurorum</i> (Rudolphi 1819)	<i>N. natrix</i>	3	2–12
<i>Leptophallus nigrovenosus</i> (Bellingham 1844)	<i>N. natrix</i>	1	4
	<i>V. berus</i>	1	1
<i>Macrodera longicollis</i> (Abildgaard 1788)	<i>N. natrix</i>	7	1–8

Table 1 (Contd.)

Species of helminth	Host	Number of:	
		Infected hosts	Helminths (min-max)
<i>Metaleptophallus gracillimus</i> (Luhe 1909)	<i>N. natrix</i>	1	3
<i>Neodiplostomum major</i> (Dubinina 1950), larvae	<i>N. natrix</i>	1	19
	<i>V. berus</i>	2	10-15
<i>N. spathoides</i> (Dubois 1937), larvae	<i>N. natrix</i>	1	80
	<i>V. berus</i>	1	20
<i>Neoxysomatium brevicaudatum</i> (Zeder 1800)	<i>N. natrix</i>	2	1-3
	<i>V. berus</i>	1	1
<i>Ophiotaenia europaea</i> (Odening 1963)	<i>N. natrix</i>	3	1-32
<i>Opisthioglyphe ranae</i> (Froelich 1791)	<i>N. natrix</i>	2	3-7
	<i>V. berus</i>	2	1-2
<i>Oswaldocruzia filiformis</i> (Goeze 1782)	<i>N. natrix</i>	4	1-2
	<i>V. berus</i>	2	1-2
<i>Paralepoderma cloacicola</i> (Luhe 1909)	<i>N. natrix</i>	3	2-6
<i>Physocephalus sexalatus</i> (Molin 1860), larvae	<i>N. natrix</i>	2	20-30
	<i>C. austriaca</i>	1	8
	<i>V. berus</i>	2	20-30
<i>Rhabdias fuscovenosus</i> (Railliet 1899)	<i>N. natrix</i>	3	2-5
	<i>C. austriaca</i>	1	2
<i>Spirometra erinacei</i> (Rudolphi 1819), larvae	<i>N. natrix</i>	3	1-2
	<i>V. berus</i>	1	1
<i>Strigea sphaerula</i> (Rudolphi 1803), larvae	<i>N. natrix</i>	2	34-100
	<i>V. berus</i>	1	1000
<i>S. strigis</i> (Schrank 1788), larvae	<i>N. natrix</i>	1	100
	<i>V. berus</i>	1	90
<i>Telochis assula</i> (Dujardin 1845)	<i>N. natrix</i>	2	2-7